SR 167 Tier II EIS
WILDLIFE, FISHERIES AND
THREATENED AND ENDANGERED SPECIES
Section 3.4 (page 3-97)

3.4.1 STUDIES PERFORMED AND COORDINATION CONDUCTED (P. 3-98)

- **Specify affected Tribes are to be involved with ESA consultation** and Biological Assessment review, as appropriate. T03-001

3.4.2 AFFECTED ENVIRONMENT (P. 3-99)

- **Characterize ecological history information for project area** and emphasize value in achieving ecological restoration. T03-002

Wildlife and Wildlife Habitat (p. 3-100)

- **Emphasize the relative significance that "generally small and disconnected" other habitat types contained within "developed areas" have** – in the context of the rapidly urbanizing environment of the project area.
- **Emphasize lack of specific data relating to wildlife usage of upland forest habitats** located in the project area.
- **Emphasize relative significance of the three forested areas within the study area** in terms of their past, present and anticipated future ecological and/or functional values.
- **Emphasize certainty/uncertainty regarding use of project area upland forest habitats** by deer and/or long -tailed weasels. T03-003
- **Emphasize certainty/uncertainty regarding use of project wetlands and riparian corridors** by red fox and/or coyote.
- **Emphasize disparities between historic/current, as well as current/future riparian conditions** (e.g. regulatory, ecological, etc.) associated with the Hylebos/Surprise Lake Drain, the Wapato Creek, and Puyallup River drainage systems.
- **Emphasize ecology of open water habitat migratory bird species** affiliated with the project area, including their relative historic-current-future conditions.
- **Emphasize total life history data and/or ecological needs for the eagle populations** that generally use the overall project area (forests/trees, riparian/shoreline, pond/lake/stream/river waterbodies, etc.).

Special Federal Status Migratory Birds (p. 3-102)

- **Emphasize local bald eagle populations usage of local black cottonwood trees (especially large/mature)** as appropriate - particularly the black cottonwood trees of both

RESPONSE T03-001

Section 7 consultations will be coordinated with the Puyallup Tribe of Indians.

RESPONSE T03-002

Historical information is analyzed in the cumulative impacts section now incorporated into section 3.4 of the FEIS.

RESPONSE T03-003

We sincerely appreciate the Puyallup Tribal Fisheries Division commitment to collaborate closely with the project team, including the review of the revised discipline reports (water resources, wetlands, and wildlife, fisheries, and threatened and endangered species) which were updated to respond to comments. Based on your feedback over the last two years, we believe the FEIS addresses this comment, see sections 3.4 of the FEIS.

the project area and/or the general portion of the Puyallup River or river valley environment associated with the project area.

- **Detail probable/known information relating to bald eagle foraging behavior** associated with the relative project area (or Hylebos Creek, Wapato Creek or lower Puyallup River systems).

T03-004

- **Emphasize relative usage of existing local tree species/tree sizes by bald eagles** based upon relative suitability or availability preferences; e.g. selective preference for large cottonwood-deciduous - in addition to, or in the absence of large fir/conifer species - when foraging along river, or selecting perch or nest trees, etc.

- **Emphasize possible presence of indigenous prairie habitat as a feature that was** associated with these localized proximities of the early tribal reservation/upriver environmental setting.

Fisheries (p. 3-105)

- **Specifically mention "Simons Creek" as among the fish-bearing waters listed** within the study area - it is a historic tributary of Wapato Creek that has a special, high fish-production value in today's modern era.

Special Status Species and Habitat (p. 3-105)
Puyallup River (p. 3-106)

- **Reconcile references to Puyallup River -** e.g. 1) draining "...approximately 970 square miles and is divided into two watersheds: the upper Puyallup River watershed and lower Puyallup River watershed…"; 2) "...The headwaters of the upper Puyallup watershed are located at the base of a glacier along the heavily forested flanks of Mount Rainier…"; and 3) "…lower Puyallup River begins at the rivers convergence with its first major tributary, the Carbon River, near the City of Orting..." - with the separate reference that describes "...The Carbon and White Rivers convey flow from 75 percent of the lower Puyallup River watersheds drainage area...". [Overall, it seems confusing as to whether the Puyallup River watershed (e.g. 970 square miles) actually includes the White and Carbon River drainage systems, or not.]

T03-005

- **Strike general description of the headwaters of the upper Puyallup River watershed being located "at the base of a glacier along the heavily forested flanks of Mount Rainier" as misleading** - given that: 1) the true flanks of the volcano named Mt. Rainier are not necessarily heavily forested, but really contain the more open sub-alpine forests (if anything); 2) that the upper Puyallup River is essentially commercially owned in most places towards the west side of Mount Rainier National Parks' boundaries; and 3) that "heavily forested" does not accurately characterize the areas of commercial forest which exist directly west of the areas of the upper Puyallup watershed that are situated directly to the inside of Mount Rainier National Park.

T03-006

- **Add every stream that is recognized in the records utilized by the Washington State Department of Natural Resources/DNR to the list of smaller streams** noted as discharging directly/indirectly into the Puyallup River (all Type 3, Type 4, Type 5; every fish/non-fish bearing perennial/intermittent streams, etc.). For example, a Type 4/Type 3 stream [Ball Creek] that originates west of Alderton and flows northward into Puyallup

RESPONSE T03-004

Bald eagles are described in the project Biological Assessment, and have been incorporated in section 3.4 of the FEIS.

RESPONSE T03-005

Simon's Creek is mentioned in the project BA and is added to the FEIS. The description of the Puyallup River Watershed is reworded for clarity.

RESPONSE T03-006

Sections 3.2, 3.3, and 3.4 of the FEIS were revised to address impacts on a sub-watershed basis.

River is not mentioned; the same being true for the stream [Elhi Creek] that originates in the Elhi area to confluence with the Puyallup River to the west - in addition, Horse Haven Creek is a major tributary of the Puyallup River that enters the river *upstream* of the Puyallup River/Carbon River confluence (but to the opposite side of Puyallup River from the town of Orting). There are other pertinent stream systems that could/should be mentioned in an historical ecology context (if nothing else) - e.g. "Salishan Creek" (both historic and current) as a fish-bearing stream which formerly flowed directly to the lower Puyallup River in the general vicinity of the intersection of Portland Avenue and River Road (in modern day Tacoma).

- **Emphasize hydrologically-related stream systems when listing the smaller streams** that "…discharge directly or indirectly into the Puyallup River below the city of Orting…". Current list should be re-ordered as follows: [*Horse Haven Creek*], Canyon Falls Creek, Fennel Creek, [*Elhi Creek, Alderton Creek*], Clarks Creek-Rody Creek-Diru Creek, Canyon Creek-Clear Creek-Squally Creek-Swan Creek, [*Salishan Creek*]. **Italics are suggested additions to the list of streams currently presented in the DEIS.*

- **Refine the statement suggesting that WSDOT intends to "improve Puyallup watershed by riparian restoration of several reaches of the Hylebos, Wapato, and Surprise Lake drainages"** to more accurately reflect that 1) the Hylebos-Surprise Lake drainage system is a system that is relatively independent of the Wapato and/or Puyallup River drainage systems respectively; 2) that the Wapato Creek system is an independent system (that includes all-important Simons Creek); 3) that the Puyallup watershed only includes the Hylebos and/or Wapato Creek systems in that they each empty into Commencement Bay; and 4) that the restoration work that is being anticipated to have direct effect upon properties that are truly located within the Puyallup watershed (according to the definition in preceding paragraph) would actually be the project anticipated for the Union Pacific properties. T03-006

- **Amend definition of drainages included within the definition of the Puyallup watershed to officially include/exclude the Hylebos Creek and/or Wapato Creek drainages**, as appropriate.

- **Reconcile or justify statements regarding the White River** - e.g. the headwaters being located at the glaciers of Mount Rainier and "...hence the Puyallup River has...shifting braided channels and naturally colder water temperatures downstream of the confluence of the White River..." in terms of 1) the earlier references to the upper Puyallup River originating separately on its' own from a different Mount Rainier glacier (and thus inherently equally as cold as the White River); and 2) characterizing Puyallup River downstream of the White River as having "shifting braided channels" and/or "naturally colder water temperatures" is likely misleading (and unlikely to be either scientifically, or realistically accurate).

Hylebos Creek (p. 3-108)

- **Emphasize relative condition of riparian systems of Hylebos Creek**, emphasizing past-present-future expectations. T03-007

- **Emphasize relevance and value of a chinook population recovery strategy for Hylebos Creek.**

RESPONSE T03-007

A Net Environmental Benefits Analysis (NEBA) was conducted to quantitatively estimate the benefits of the Riparian Restoration Proposal (RRP), please see section 3.17.2 of the FEIS.

- **Specifically describe the in-channel fish habitat features currently present** within the portions of Hylebos Creek associated with the study area. T03-007

Wapato Creek (p. 3-111)

- **Emphasize information describing upper extents of known fish presence and/or suitable habitats.**
- **Emphasize Simons Creek as a significant fish-production tributary** within the Wapato Creek system.
- **Specify relative proximity of Ecology 303(d) listed stream reaches** in comparison to reaches associated with the project area.
- **Specifically describe the in-channel fish habitat features currently present** within the portions of Wapato Creek associated with the study area.

T03-008

Surprise Lake Drain (p. 3-112)

- **Specifically describe the in-channel fish habitat features currently present** within the portions of Surprise Lake Drain associated with the study area. T03-009

Vegetation (p. 3-113)

- **Emphasize relative ecological significance (including historic) of the remaining small, isolated parcels of original forestlands** in the project area.
- **Specify where the "limited undisturbed riparian corridors" along Wapato and Hylebos creeks are located**, their relative proximity to the project area, and inherent association with the stream reaches being targeted for riparian restoration work.
- **Emphasize the overall ecological and/or riparian significance of the Black cottonwood overstory trees** associated with either the project and/or nearby riparian areas.

T03-010

3.4.3 IMPACTS OF CONSTRUCTION (P. 3-114)

Build Alternative (p.3-115)

Wildlife and Wildlife Habitat (p. 3-115)

- **Emphasize relative significance and specific nature of the 29 acres of forested areas** that would be directly affected by construction - e.g. mature deciduous forest; corridor would fragment the forest stands..., etc. T03-011
- **Emphasize relative significance of "perching on the hillsides near the project corridor" by bald eagle** - for example, the availability, adequacy and/or value of suitable perch trees (conifer, deciduous/cottonwood?) existing in the vicinities of the project area - T03-012

RESPONSE T03-008

Section 3.4 of the FEIS has been revised to consider information such as the Ecology 303(d) listed stream reaches within the project study area, and baseline habitat conditions of affected stream systems.

RESPONSE T03-009

Baseline habitat conditions in Surprise Lake Drain are described in section 3.4.2 of the FEIS.

RESPONSE T03-010

A description of existing vegetation and impacts to vegetation has been updated and is described by sub-basin in section 3.4 of the FEIS.

RESPONSE T03-011

Additional detail regarding forested areas and associated impacts is incorporated in section 3.4 of the FEIS.

RESPONSE T03-012

Three bald eagle nest sites are located over one mile from the project area. The Section 7 effect determination for this threatened species is not likely to adversely affect.

or, just perch trees in general that are associated with the project study area (for example, is there an optimal arrangement or amount that should be targeted)?

T03-012

- **Specify whether eagles might perch only "on the hillsides near the project corridor", or might also perch at other areas** nearby/upon the project area.

- **Emphasize the restoration work being focused upon the independent and separate Hylebos Creek, Wapato Creek, and Puyallup River mainstem riparian systems as each being "notable positive benefits"** of the proposed riparian plan.

- **Clarify meaning of the statement "The proposed riparian restoration plan would link fragmented upland habitats that extend well beyond the project limits"** (as opposed to the existing format - which is merely a reference to a different section of the DEIS report).

T03-013

- **Clarify any short and/or long-term strategies that are anticipated for ensuring that the projects' riparian restoration areas will realize their full potential** of anticipated wildlife habitat benefits - e.g. plantings will mature, stream stabilizes enough to support certain species, suitable habitat is achieved, etc.

Migratory Birds (p. 3-117)

- **Emphasize lack of available local data pertaining to relocation of displaced birds** at other similar habitats nearby (e.g. carrying capacities of nearby habitat, competition for available space, increased stress and competition for food, etc.).

T03-014

- **Explain/clarify meaning or intent underlying sentence that identifies the "...Impacts to riparian, urban, and aquatic habitat have not been quantified..."** - why weren't they, or, is it expected that they will be?

Fisheries (p. 3-118)

- **Describe strategies/assurances anticipated for ensuring that "the Lower Hylebos Creek and Surprise Lake Drain's riparian forest matures"**, and/or that "many of the trees would fall into the stream...adding complexity to the channel morphology".

T03-015

- **Elaborate upon significance of stating that "...WSDOT may need to maintain the Wapato Creek channel in its' existing location to prevent damage to adjacent properties..."** - is it implying that the existing channel may not be relocated for mitigation, or, that the future relocated channel may never really be allowed to flood outside of the new channel (over both the short and long-term)?

T03-016

- **Emphasize importance and/or value of strategies that counteract/circumvent the "...ditching management practices of the agricultural owners of the channel..."** - e.g. strategies for protecting the streams' values as a spring-fed source of water which is used by juvenile salmon - such as ESA-protected Chinook salmon populations - as a stable off-channel refuge (when main-stem Hylebos Creek floods during the winter – and spring or autumn? – months).

T03-017

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RESPONSE T03-013

In collaboration with stakeholders such as the Tribe, the RRP has been further described in sections 3.2, 3.3, 3.4, and 3.17 of the FEIS. Future design of the RRP will be coordinated with the Tribe through the RRP Technical Advisory Group.

RESPONSE T03-014

An analysis of the potential occurrence of migratory birds in the Migratory Bird Treaty Act (MBTA) study area was conducted for the project and is discussed in section 3.4 of the FEIS.

RESPONSE T03-015

The goal of the RRP is to provide stormwater flow control management, and compensatory mitigation for stream channel impacts, through the creation, restoration, and enhancement of self-sustainable native riparian and in-stream habitat in the Hylebos and Surprise Lake Tributary sub-basin, and Wapato Creek sub-basin. Design of the RRP will also provide for fluvial processes including natural sediment transport, channel migration, debris passage and LWD placement and recruitment.

RESPONSE T03-016

The Wapato RRP entails establishing an approximately 9000 lf long continuous riparian buffer along both sides of the existing stream, where possible. The RRP would result in a corridor through which Wapato Creek would flow. Approximately 73 acres of existing farmlands and residences would be converted into a riparian landscape by removing encroachments (buildings, roads, culverts and other infrastructure) from the land. The riparian area would be planted with native vegetation.

RESPONSE T03-017

Clarification is made in sections 3.2, 3.3, and 3.4 of the FEIS.

- **Specify relative number/locations of stream crossing structures anticipated** for the Hylebos Creek, and/or Wapato Creek-related waterbodies; as well as associated fish presence. T03-018

- **Specify whether the "approximately 8,500 lineal feet of Wapato Creek" to be restored (via the riparian restoration proposal) is an amount that is/is not derived from total distances along both sides** of the creek (as opposed to the total linear distance of stream channel that will be restored). For example, 8500 "riparian" feet is (8500/2) = 4250 "channel" feet - 8500 feet of stream infers that 1.6 miles of stream is expected to be restored (vs. 0.8 miles @ 4250 feet). T03-019

- **Specify whether the "additional 2000 lineal feet of riparian restoration" anticipated for Surprise Lake Drain is an amount that includes both sides of the stream** (and therefore equates to about 1000 feet of stream channel length), and reconcile either figure (2000'/1000') with the stated intention of reconfiguring "approximately 2400 feet" of Surprise Lake Drain. Overall, specify which reaches of Surprise Lake Drain will/will not receive riparian restoration benefits?

- **Emphasize importance/significance of a strategy for assuring that the benefits of restoring riparian areas in the Hylebos/Surprise Lake Drain system will in fact result and persist** - e.g. counteract the "...current management practices (ditch cleaning) by private landowners...". T03-020

- **Re-position all references in the fish/wildlife section pertaining to Surprise Lake Drain area next to information that pertains to Hylebos Creek** (since it is a Hylebos Creek tributary) - having these sets of information interrupted with information relating to the separately located Wapato Creek system diminishes the ability to fully appreciate the collective benefits that should result from the combination of direct treatments focused upon the riparian aspects of the overall Hylebos Creek-Surprise Lake Drain ecological system. T03-021

Vegetation (p. 3-121)

- **Emphasize impacts of construction operation on mature vegetation (especially black cottonwood trees)** associated with project area - describe anticipated restoration future needs/long-term expectations regarding mature trees (deciduous and conifer) in areas associated with the project proposal (especially in terms of endangered salmon recovery planning). T03-022

3.4.4 IMPACTS OF OPERATION (P. 3-121)

Build Alternative (p. 3-122)

Wildlife and Wildlife Habitat (p. 3-122)

- **Emphasize that permanent introduction of a 6-8 lane urban freeway system (which is expected to receive intensive and around-the-clock daily use into the foreseeable future) is prone to having new, profound and permanent adverse impacts upon wildlife** support systems in this local area (especially terrestrial). [A new freeway corridor at the proposed location could result in being a significant new barrier for wildlife which currently depend upon the relative connectivity-continuity of the habitat T03-023

RESPONSE T03-018

Please see tables 3.2-6, 3.2-8, and 3.2-9 of the FEIS for information about stream crossings per sub-basin. In addition, figures 2-2, 2-5, 2-6, 2-7, and 2-10 provide more specific crossing location information.

RESPONSE T03-019

The entire section of the Surprise Lake Drain channel, from its confluence with the mainstem of Hylebos Creek to the crossing at Freeman Road will be restored to improve the quality and condition of the stream, provide flood control, and habitat benefits. This amounts to approximately 5,340 linear feet of new channel. Additionally, 29 acres of adjacent riparian area will be protected. Also, please see response to T03-016, above.

RESPONSE T03-020

Benefits of the RRP are described in section 3.17.2 of the FEIS.

RESPONSE T03-021

Surprise Lake Drain and its association with Hylebos Creek is clarified.

RESPONSE T03-022

Discussion of riparian impacts versus riparian improvements resulting from proposed riparian restoration and wetland mitigation are described in sections 3.4 and 3.17.2 of the FEIS.

RESPONSE T03-023

The addition of low-cost wildlife crossings and the use of over-sized culverts or clear-spanning structures will be considered at appropriate locations.