



State of Washington  
Department of Fish and Wildlife

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PO Box 47696  
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Subject: 2019 proposed modifications to the Aquatic Plant and Algae Management General NPDES permit and Aquatic Noxious Weed Management General NPDES permit

Dear Ms. Callaway,

Thank you for engaging Washington Department of Fish and Wildlife in Ecology's evaluation of proposed modifications to these two permits. We understand you are proposing to add three herbicides, one algaecide, two phosphorous inactivation products and several adjuvants registered by Washington State Department of Agriculture. Fish and Wildlife has comments on the proposed new chemicals and also on the process change noted in the permits.

As you know, Fish and Wildlife is both a protector of fish and wildlife and a manager of agency-owned lands. As protectors we are cognizant of the risks to fish and wildlife species from these chemicals, and as land managers we are deeply engaged in weed management in terrestrial and aquatic environments. We have considered the proposals from both perspectives.

In general, Fish and Wildlife supports Ecology's continued work to ensure the most effective chemicals with the least environmental consequences are available for use by licensed applicators in Washington, and we recognize the tradeoffs that are made in bringing a chemical into common use. Fish and Wildlife is appreciative of Ecology's ongoing coordination with Fish and Wildlife staff, both on locations of priority habitats and species as well as on the protections necessary for some of the most vulnerable of those species, as expressed in the timing table associated with the Aquatic Plant and Algae Management permit. Fish and Wildlife looks forward to continued cooperation as we work to improve this table over the next few years.

With respect to the specific modifications proposed for these permits, following are Fish and Wildlife's comments.

**APAM Permit S4.B.4 Table 3: Aminopyralid**

Fish and Wildlife understands and concurs with Ecology's recommendation not to require adherence to timing windows for fish in the application of this chemical. Please emphasize that people must check the timing table for other priority species such as amphibians and follow the instructions there before applying this chemical.

**APAM Permit S4.B.4 Table 3: Aminopyralid 48-hour re-entry restrictions**

Ecology has not explained the justification for the 48-hour re-entry restriction. Other products in the table (i.e. glyphosate, imazapyr, etc.) don't have re-entry periods, so why does this product? WDFW suggests that if the 48-hour re-entry period is not explicitly required by the label, the requirement should be removed from this permit.

**APAM Permit S4.B.4 Table 3: Treatment Limitations for Aminopyralid**

The APAM already limits the area and percent of shoreline that can be treated for nuisance vegetation. WDFW suggests the treatment limitation "*Do not apply:*" be changed to "*Because of residual effects, limit applications:*" This is important to WDFW because there are situations (consider a lake management district) when a treatment area may contain a vacant lot/undeveloped lot that would complicate a treatment approach. WDFW has access sites with undeveloped shoreline where spot treatment or the shoreline/emergent vegetation using aminopyralid would be appropriate. Otherwise, WDFW would be required to return yearly with a non-selective chemical and treat the same area, thus defeating the purpose for authorizing the use of this chemical.

**APAM Permit S4.B.4 Table 3: Florpyrauxifen-benzyl (ProcellaCOR)  
Sodium carbonate peroxyacetic acid  
Topramezone**

Fish and Wildlife understands Ecology is not recommending adherence to timing windows for fish in the application of these chemicals. WDFW notes that no toxicology work has been done with these chemicals for amphibians, especially locally vulnerable species such as northern leopard frog and Oregon spotted frog. Please ensure people are checking the timing table for other priority species such as amphibians and following the instructions there before applying these chemicals. WDFW also suggests including brand names as well as active-ingredient chemical names in the glossary at the end of the permit.

**APAM Permit item S4.D.7.e: Alternate timing windows**

WDFW supports a more generic Ecology contact for requesting alternate timing windows and appreciates the statement clarifying that Ecology will consult with WDFW on these requests.

**NOX Permit item S4.B.3.a: Adding aminopyralid, "except where restoration projects may occur within 18 months of treatment"**

WDFW is concerned with the prohibition as expressed in the proposal because it can be more restrictive than is needed for the restoration plans in the application area. For example, aminopyralid use might be desired in sites where weed control is needed and future planting will not occur. Instead WDFW recommends replacing this prohibition with a more flexible statement such as "*In restoration sites, do not seed, or plant in zones that have been treated with aminopyralid for at least 18 months, unless the plant material is known to be resistant to the product. Aminopyralid may be used in restoration sites to specifically control and suppress noxious weeds where planting will not occur.*"

**NOX Permit item S4.B.3.j: Topramezone**

WDFW notes that no toxicology work has been done with this chemical for amphibians, and would like Ecology to require that applicators contact WDFW prior to applying this chemical in locations with sensitive amphibian species. Those locations are generally noted on the Timing Table

associated with the APAM permit. Alternatively, more toxicology work for effects on amphibians, including effects to olfaction, should be conducted prior to approval.

**NOX Permit item S6.A.2.a-c      Aminopyralid monitoring requirements  
and S7:**

WDFW supports the reporting and monitoring requirements for this chemical until uncertainties about its persistence in typical application locations in Washington can be better understood.

**NOX Permit S6.A.2.d:              Aminopyralid Ongoing Post-Treatment Site Assessment**

It might not be appropriate in all situations to require ongoing post-treatment site assessments “...every year until desirable plant cover (non-noxious weeds) reaches 70 percent or more.” For example, if knotweed is treated on a sandbar, there may never be native vegetation recolonizing the site. WDFW recommends, instead, that post-treatment site assessment in locations where vegetation regrowth is not expected should be continued every year for 3 years without vegetation regrowth. The information gathered over this time period will indicate whether there is a problem with recolonization.

We want to let you know that there are no changes to the agency contact information since the errata for the APAM permit issued on May 18, 2016. Fish and Wildlife is working to improve methods that give Ecology staff better access to local fish and wildlife experts when requests for WDFW consultation are submitted.

As mentioned earlier, WDFW will be updating the timing table to ensure it represents our best scientific and management information. In particular, we are concerned about effects of pesticide application on fish and other priority species when air temperatures, and therefore water temperatures, get high. WDFW has witnessed some fish die-offs associated with aquatic pesticide applications under high-temperature conditions and we want to work with you to determine how applicators can best respond to these circumstances. Another concern is the general lack of amphibian testing (local species) for chemicals applied in aquatic and riparian areas. Even when these chemicals are not directly toxic to priority amphibians, chemicals might be affecting olfaction, and thus causing indirect mortality for these vulnerable species.

Thank you again for the opportunity to comment on these permit modifications. We look forward to continued coordination with you on this topic.

Sincerely,



Randi Thurston  
Protection Division Manager  
Habitat Program

Cc:    Terra Rentz              Keith Folkerts  
       Paul Dahmer             David Heimer  
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