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April 8, 2014

Ms. Michelle Arsenault  
National Organic Standards Board  
USDA-AMS-NOP  
1400 Independence Avenue, SW  
Room 2648-So, Ag Stop 0268  
Washington, DC 20250-0268

**RE: Docket: AMS-NOP-14-0006**  
**NOSB Livestock Sub-Committee**  
**Substances for Aquatic Livestock and Plant Production**

Dear Ms. Michelle Arsenault,

**Introduction:** Oregon Tilth appreciates and commends the transparency and scrutiny of the Livestock Subcommittee for their recommendations regarding synthetic substances to be added to the National List for Aquatic Livestock and Plant Production. We are particularly pleased to see the Subcommittee reach out to stakeholders and the public to gather information contained in these recommendations. We appreciate the inclusion of the minority opinions, which demonstrate the many challenges discussed in your deliberations.

Oregon Tilth realizes the multitude of comments that any single recommendation will deliver. To lighten this avalanche of opinions, we have bundled all of our comments regarding Aquatic Livestock and Plant Production with two exceptions; micronutrients and carbon dioxide for aquatic plants, which have been submitted separately. The table below is a quick summary of Oregon Tilth's comments regarding these recommendations. We have also provided short comments for recommendations that we felt needed explanation followed by a brief conclusion.

***Comment Summary Table***

Livestock Subcommittee Recommendation	Approve	Annotation Comments
Chlorine (for aquatic animals)	Yes	As proposed
Tocopherols (for aquatic animals)	Yes	As proposed
Minerals (for aquatic animals)	Yes	Recommend Open List consistent with 205.603
Vitamins (for aquatic animals)	Yes	Recommend Open List consistent with 205.603
Biologics: Vaccines (for aquatic animals)	Yes	Recommend consistency with 205.603
<b><i>Micronutrients (for use in aquatic plants)</i></b>	<b><i>Yes</i></b>	<b><i>Comments submitted separately</i></b>
<b><i>Carbon Dioxide CO2 (for aquatic plants)</i></b>	<b><i>No</i></b>	<b><i>Comments submitted separately</i></b>
Chlorine (for aquatic plants)	Yes	As proposed
Lignin Sulfonate (for aquatic plants)	Yes	As proposed
Vitamins B1, B12, H (for aquatic plants)	Yes	As proposed

**Organic Aquatic Livestock Production** – The National Organic Standards Board (NOSB) Livestock Subcommittee recommendations for adding substances to the National List for Organic Aquatic Livestock Production (NOP 205.611):

- **Chlorine in aquatic animal production:** Oregon Tilth endorses the Subcommittee’s Recommendation as written. We appreciate the annotations alignment and consistency with chlorine’s listing on the National List for synthetic substances allowed for use in organic livestock production [NOP 205.603(a)(7)]. Alignment in this respect allows for consistent interpretation by certifiers, consistent applicability across scopes and production systems, and consistent enforcement and corrective action when non-compliances are identified.
- **Tocopherols in aquatic animal production:** We support the Subcommittees’ recommendation as written.
- **Minerals in aquatic animal production:** We recommend that the annotation for minerals (for aquatic animals) match the organic livestock annotation at [NOP 205.603(d)(2)] Trace minerals, used for enrichment or fortification when FDA approved.

Consistent, high quality nutrition is paramount to successful organic livestock production. Oregon Tilth appreciates the Subcommittees recommendation that Minerals be listed categorically and not as a closed list. Aquatic livestock production is a relatively young and growing enterprise; and with organic production even more so. This recommendation will allow future aquatic producers of animals the flexibility to organically manage aquatic livestock in a manner that is not currently feasible.

- **Vitamins in aquatic animal production:** Oregon Tilth recommends that the annotation for vitamins (for aquatic animals) match the organic livestock annotation at [NOP 205.603(d)(3)] Vitamins, used for enrichment or fortification when FDA approved.

The subcommittees’ recommendation for a closed positive list of vitamins for aquatic livestock is shortsighted because it does not account for new species and production systems. It is paramount for the commercial success of organic aquatic livestock production to provide consistent high quality nutrition. This is especially true as reactive tools to treat maladies are purposely limited in organic regulation. Finally, the consistent use of National List annotations will result in higher quality interpretation and enforcement by operators and certifiers.

- **Biologics: Vaccines in aquatic animal production:** Oregon Tilth recommends that the annotation for vaccines (for aquatic animals) match the organic livestock annotation at [NOP 205.603(a)(4)] Biologics—Vaccines including the language at [NOP 205.105(e)] Excluded methods, except for vaccines: Provided, That, the vaccines are approved in accordance with [NOP §205.600(a)].

Vaccines are fundamental to disease prevention. They allow for organic livestock producers to proactively provide the best possible animal health. Without any listings on the National List, sourcing vaccines not produced using excluded methods is an increasingly growing concern. Oregon Tilth acknowledges that this is a difficult issue and any discussion must apply to both terrestrial and aquatic applications.

**Organic Aquatic Plant Production** - The National Organic Standards Board (NOSB) Livestock Subcommittee recommendations for adding substances to the National List for Organic Aquatic Plant Production (NOP 205.609).

- **Micronutrients for use in aquatic plant production:** Oregon Tilth comments submitted individually.
- **Carbon Dioxide CO2 for Use in Aquatic Plant Production:** Oregon Tilth comments submitted individually.
- **Chlorine for Use in Aquatic Plant Production:** We support the subcommittees’ recommendation as written.

- **Lignin Sulfonate in aquatic plant production:** Oregon Tilth supports the petition to allow lignin sulfonate as a micronutrient chelate for aquatic plant production. Lignin sulfonate has been a useful tool in organic crop production as other synthetic chelating agents have been prohibited for use by [NOP 205.601(j)(6)(ii)]. As stated in the petition, lignin is a primary component of wood, and sulfonated lignin is a byproduct of the wood pulping industry with low potential for environmental contamination. Oregon Tilth encourages the Subcommittee to approve this petition while ensuring the annotation for micronutrients prohibits the use of other synthetic chelates that have not been petitioned (DPTA, EDTA, etc.).
- **Vitamins B1, B12, & H in aquatic plant production:** Oregon Tilth agrees with the closed positive listing of vitamins for use in aquatic plant production because it is consistent with the annotation for vitamins allowed for organic crop production [NOP §205.601(j)(8) Vitamins, B1, C, and E].

**Conclusion** - The NOSB Livestock Subcommittee has done a commendable job of parsing, discussing and recommending these significant lists of materials. We encourage the full board to follow their lead and approve Chlorine, Tocopherols, Lignin Sulfonate and Vitamins as proposed. We encourage you all to discuss further the annotations for Minerals, Vitamins, Biologics and Micronutrients to more accurately align with current NOP regulations, and we encourage you to reconsider the recommendation for CO2.

Certifiers, Accreditors and Organic Growers appreciate consistency wherever possible; especially when a material is permitted in multiple sections of the National List. The result is the consistent interpretation by certifiers, the consistent applicability across varying scopes and production systems, and the consistent enforcement and corrective action when non-conformities are identified.

Respectfully Submitted,

Oregon Tilth

*Oregon Tilth is a nonprofit organization supporting and promoting biologically sound and socially equitable agriculture through education, research, advocacy, and certification. Oregon Tilth advocates sustainable approaches to agricultural production systems and processing, handling, and marketing.*