

Spring 2021 National Organic Standards Board (NOSB) Meeting

The Organic Trade Association's NOSB Report

On **April 28-30**, the National Organic Standards Board (NOSB) held its biannual public meeting via live online webinar. The primary purpose of NOSB meetings is to provide an opportunity for organic stakeholders to give input on proposed NOSB recommendations and discussion items. The meetings also allow NOSB to receive updates from USDA's National Organic Program (NOP) on issues pertaining to organic agriculture. This was the **59th** meeting of the National Organic Standards Board. Over the course of the three-day virtual meeting, NOSB considered **4** proposals, **7** discussion documents, and over **30** sunset materials. NOSB received approximately **860** written comments, and listened to over **10** hours of oral testimony received from over **100** commenters during two public comment webinars prior to the meeting. The full agenda for the meeting as well as all meeting materials are available on the Organic Trade Association (OTA) [spring 2021 NOSB meeting website](#). Also check out [OTA's NOSB Meeting Resource Booklet](#) for detailed background on the topics covered at this meeting.

MEETING HIGHLIGHTS

The spring 2021 NOSB Meeting was conducted virtually again (for the third time) due to the ongoing restrictions on travel and in-person gatherings imposed by the COVID-19 pandemic. For the most part, NOSB and stakeholders are getting the hang of "zooming" through public comment period and meeting proceedings. This meeting featured American Sign Language interpreters for the first time, showing NOP's commitment to inclusion for meeting participation. The meeting was also unique in that the Board is composed mostly of new members (5 members started their terms last year, and 5 more started just this year). Each subcommittee has a first-time chairperson, and everyone excelled in their new positions. Overall, there was a strong collaborative spirit among the Board members, as every vote was supported by robust and inquisitive discussion and achieved a unanimous decision.

The Organic Trade Association is highlighting the following **key outcomes** of the spring 2021 NOSB Meeting that are important to the ongoing work of our organization and the organic sector:

- **Supporting Continuous Improvement and Accountability in Organic Standards:** The backlog of unimplemented NOSB recommendations was the primary focus of public comment and discussion at the meeting. Many commenters cited the failure of USDA to complete rulemaking on animal welfare, origin of livestock, greenhouse standards, and more. NOSB members used the public meeting as an opportunity to go on record to rebuke comments made by Secretary Vilsack that USDA plans to start from scratch on the Organic Livestock and Poultry Practices rule, NOSB unanimously passed a resolution urging USDA to re-issue the OLPP rule as final without delay. Additionally, Congress introduced the Continuous Improvement and Accountability in Organic Standards Act on the last day of the meeting, and NOSB quickly responded with a statement of unanimous support for the bill. **More details on Page 5 (CIAO) & 10 (OLPP).**
- **Ion Exchange and Paper Pots proposals pass unanimously:** The NOSB completed recommendations on two topics that have been a focus of certified inconsistency over the past many years. Paper pots (and other paper-based planting aids) as well as ion exchange filtration have been allowed by most certifiers but regulatory clarity is needed to ensure clear and consistent implementation. These recommendations will ensure continued access to these important materials and technologies while also resolving certified inconsistencies. **More details on Page 7 (paper) & 9 (ion exchange).**
- **Supporting Human Capital Capacity Building:** NOSB unanimously passed a proposal on a strategy for recruitment and talent management of organic inspectors and reviewers. The proposal addresses the decline in qualified individuals who desire to be organic inspectors and certification reviewers, a concern that is only more critical as the organic industry grows and compliance verification requirements increase, such as those in the forthcoming

Strengthening Organic Enforcement rule. Shortly after the NOSB Meeting, NOP launched a [new funding opportunity](#) to support and expand the pool of qualified inspectors and reviewers. NOP will fund projects aimed at organic inspector and reviewer workforce development, recruitment, and retention. Application deadline is July 2. **More detail on Page 6.**

- **Looking ahead to Ammonia Extract:** The discussion document on a petition to prohibit nonsynthetic forms of Ammonia Extract garnered was the subject of significant discussion and public comment at this meeting. NOSB is wrestling with technical aspects of this category substance as well as a fundamental question of whether these substance are compatible with organic principles and a system of sustainable agriculture. This topic will continue to be a major focal point in the next NOSB meeting. **More detail on Page 7.** ***OTA Member Opportunity – contact jmirenda@ota.com to participate in a member task force on ammonia extract.*

AT-A-GLANCE MEETING OUTCOMES

PROPOSALS: NOSB considered **4** proposals at this meeting. Of the proposals, **3 PASSED** (referred to USDA for approval and implementation).

- **Paper-Based Planting Aids (Crops)** – proposal to allow with restrictions on biobased and cellulose content **is adopted**
- **Ion Exchange Filtration (Handling)** – proposal on the use of resins, membranes, and recharge materials **is adopted**
- **Human Capital: Strategy for Recruitment and Talent Management of Organic Inspectors and Reviewers** – proposal **is adopted**
- **Biodegradable Biobased Mulch (Crops)** – proposal to allow biodegradable mulches that are not 100% biobased **is sent back to subcommittee**

RESOLUTIONS: NOSB communicated **unanimous support** for **2** key issues

- **Resolution on Organic Livestock and Poultry Practices Rulemaking:** NOSB voted unanimously in support of a resolution calling for USDA to re-issue the OLPP rule with policy considerations related to outdoor access and space requirements as established in 2017 without further delay.
- **Support for the Continuous Improvement and Accountability in Organic Standards Act:** In response to the introduction of the Continuous Improvement and Accountability in Organic Standards Act, NOSB Chair Steve Ela made a statement of unanimous Board support for the bill.

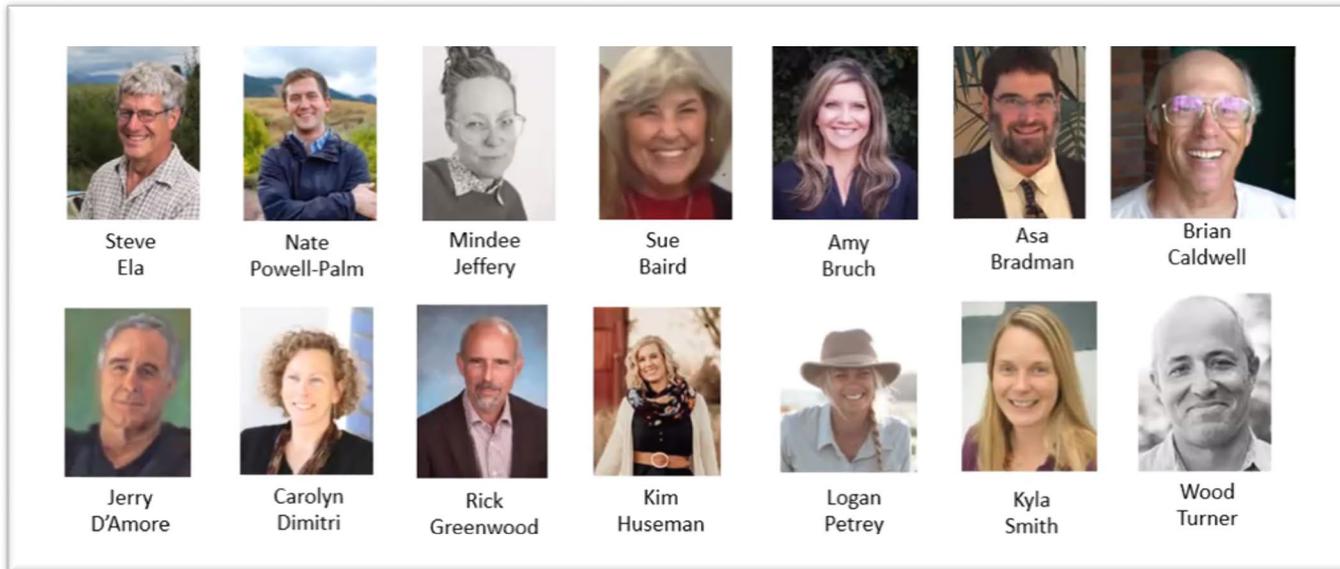
DISCUSSION DOCUMENTS: NOSB considered **7** discussion documents at this meeting.

- **Ammonia Extract (Crops)** – discussion on a petition to prohibit nonsynthetic ammonia extract fertilizer
- **Kasugamycin (Crops)** – discussion on a petition to allow kasugamycin (antibiotic) for control fire blight control
- **Zein (Handling)** – discussion on a petition to allow zein (corn protein) as food coating on organic foods
- **Fish Oil (Handling)** – options for restricting sources of fish oil to minimize environmental harm
- **Excluded Methods** – identifying emerging technologies and determining whether they will be considered excluded methods (thereby prohibited) in organic
- **2021 Research Priorities** – discussion on NOSB’s annual list of research priorities for organic food and agriculture
- **Human Capital: Supporting the Work of NOSB** – exploring opportunities to obtain assistance for NOSB, as appropriate, to help alleviate some of the workload

SUNSET REVIEWS: NOSB discussed over **30** National List inputs that are scheduled for Sunset Review this year. NOSB will vote on these at the fall 2021 meeting.

NOSB MEMBERS

This 15-person citizen advisory board brings together volunteers from around the United States. It is made up of 4 farmers/growers, 2 handlers/processors, 1 retailer, 1 scientist, 3 consumer/public interest advocates, 3 environmentalists, and 1 USDA accredited certifying agent.



Board Members for the Spring 2021 Meeting

- Farmers: [Steve Ela](#) (Chair), [Nathan Powell-Palm](#) (Vice Chair), [Amy Bruch](#), [Logan Petrey](#)
- Handlers/Processors: [Kimberly Huseman](#), [Gerard D'Amore](#)
- Retailer: [Mindee Jeffery](#) (Secretary)
- Scientist: vacant
- Consumer/Public Interest: [Sue Baird](#), [Carolyn Dimitri](#), [Brian Caldwell](#)
- Environmentalist/Resource Conservationist: [Asa Bradman](#), [Rick Greenwood](#), [Wood Turner](#)
- Accredited Certifying Agent: [Kyla Smith](#)

CALL FOR NOMINATIONS: USDA is [accepting applications](#) until June 1 for those interested in serving on NOSB. Nominations are being sought from qualified individuals for 4 open seats: Farmer; Environmentalist/Resource Conservationist; Consumer/Public Interest; Scientist. USDA is encouraging applications from traditionally underrepresented individuals, organizations, and businesses. OTA members interested in serving on NOSB may contact OTA for guidance on the nomination process.

USDA REPORT

Mae Wu, Deputy Under Secretary of Marketing and Regulatory Programs, provided welcoming remarks at the NOSB Meeting. She expressed gratitude for the organic community that make organic such a successful sector of U.S. agriculture, and celebrated organic as a driver of rural economic development, climate change solutions, and opportunities for a robust, diverse and resilient food system. USDA is committed to continuous improvement of the organic standards and is **prioritizing rulemaking** on Strengthening Organic Enforcement, Origin of Livestock, Inerts, and other National List rules. USDA is also committed to providing **pandemic assistance** to organic farms and business through new provisions and funding authorized by the latest COVID-relief package and American Rescue Act. Ms. Wu also announced that **Jenny Lester Moffitt** has been nominated by Secretary Vilsack to serve as Under Secretary of Marketing and Regulatory Programs at USDA. Moffitt has deep-rooted connections to the organic industry, having managed her family’s organic walnut farm and served as the Under Secretary of California’s Department of Food and Agriculture.

Dr. Jenny Tucker, Deputy Administrator of the National Organic Program (NOP), prepared a pre-recorded report on the activities of NOP and also presented supplementary remarks live during the meeting. The full recorded presentation is available in the [Organic Integrity Learning Center](#) at Course “NOP-998 - NOP Presentations.” *Need a Free Account? [Sign up here.](#)* Dr. Tucker’s presentation focused on key program areas including Strong Organic Control Systems, Robust Enforcement, Developing Standards, and Stakeholder Engagement. Several of the highlights are summarized below.

- **Import Oversight:** USDA ended its recognition agreement with India and a transition period is in process. NOP’s risk-based regional surveillance is currently focused on 1) organic corn and wheat from the Black Sea Region, 2) organic soybeans from India, and 3) organic blueberries from Latin America. NOP is currently working on revising the policy sections of the **Strengthening Organic Enforcement (SOE)** rule based on comments received on the proposed rule. As part of the implementation, NOP is developing an import and export certificate module within the Organic Integrity Database that will allow international certifiers to issue organic import certificates to final handling operations as they prepare to export their commodities. NOP will keep stakeholders updated throughout this summer and fall as they develop the new technology.
- **Livestock Compliance:** NOP is expanding its livestock compliance program to include auctions and slaughterhouses, focusing particularly on an operator’s ability to trace livestock from birth to processing. NOP is also working with APHIS Investigative and Enforcement Services to share information and training on livestock standards and enforceability.
- **Origin of Livestock:** NOP is planning to open another comment period on the proposed rule for **Origin of Livestock (OOL)**. The notice is currently under review at the Office of Management and Budget. Once OMB completes its review, there will be a posting in the *Federal Register* and a public comment period.
- **National List:** An Advance Notice of Proposed Rulemaking on **Inerts** is in development and will enter the clearance process shortly. A Final Rule for allowing **Oxalic acid dihydrate, Pullulan, and Collagen gel casing** is currently in clearance and will publish shortly, as will a Proposed Rule for removing Sunset 2022 Materials: **Oxytocin, several Colors, Whey Protein Concentrate, and Turkish Bay Leaves.**
- **Human Capital Capacity Building:** NOP has launched a [new funding opportunity](#) to support and expand the pool of qualified inspectors and reviewers. NOP will fund projects aimed at organic inspector and reviewer workforce development, recruitment, and retention. Application deadline is July 2.

- **Staffing:** NOP has grown to 70 staff members. The Accreditation Division and the Compliance and Enforcement Division have both doubled in size. The Standards Team has added staff with specific expertise in materials review. USDA accredits 77 organic certifiers worldwide, and has 6 accreditation managers and 8 auditors.
- **“What Makes Rulemaking Successful”:** Part of Dr. Tucker’s live report was an acknowledgement of stakeholder frustration that USDA has not completed rulemaking on many critical NOSB recommendations that would advance the organic standards, and an explanation of why certain rulemaking projects are successful or not. Rulemaking projects are most successful when they 1) Align with the Organic Foods Production Act, 2) Address needs with the most cross-community support, 3) Will resolve known market inconsistencies, and 4) When the economic benefits are clear.



****RESPONSE FROM CONGRESS:** A legislative solution to clearing the backlog and establishing a future framework for accountability was introduced in to Congress following Dr. Tucker’s report on the last day of the NOSB Meeting. The [Continuous Improvement and Accountability in Organic Standards Act](#) requires USDA to implement recommendations from NOSB that have wide support from the organic industry in a timely manner, and calls for a more responsive and transparent federal process for the stewardship of organic that brings the government up to speed with the modern organic sector. Learn more at [OTA.com/future](https://ota.com/future) and [add your business name](#) to the growing [list of endorsers](#).

****RESPONSE FROM NOSB:** [NOSB expressed unanimous support](#) for the bill. NOSB Chair Steve Ela provided a statement on the record that “the Board is unanimous in its support for this,” “this really respects the work of the NOSB,” and “I hope that will be taken in to account by the higher ups.”

SPECIAL REPORT FROM NATIONAL INSTITUTE OF FOOD AND AGRICULTURE: Mat Nguoujio (National Science Liaison, Institute of Food Production and Sustainability) and Steve Smith (National Program Leader, Division of Animal Systems) provided a [presentation](#) on National Institute of Food and Agriculture (NIFA) organic programs with particular focus on The Organic Agriculture Research and Extension Initiative (OREI) and The Organic Transitions (ORG) programs. Congress has increased funding to OREI allowing for more organic-focused research. NIFA relies on the NOSB’s annual lists of research priorities as indicators of whether research topics are relevant – if included on NOSB’s list, a project is automatically classified as relevant. NIFA provides a direct link to current NOSB research priorities in its Request for Proposals so that organic priorities are always clear to applicants.

OUTCOMES OF NOSB AGENDA TOPICS (BY SUBCOMMITTEE)

COMPLIANCE, ACCREDITATION, & CERTIFICATION (CAC) SUBCOMMITTEE

- **HUMAN CAPITAL: STRATEGY FOR RECRUITMENT AND TALENT MANAGEMENT - ORGANIC INSPECTORS AND REVIEWERS (PROPOSAL):** Human capital refers to the skills, knowledge, and experience held by an individual or population, and is generally considered one of the most important intangible assets that contribute value to an organization or community. NOSB's work agenda item on this topic is in response to a memo from NOP requesting that the Board facilitate a public discussion related to Human Capital Strategy for Organic Inspectors and Reviewers. The Subcommittee proposal includes several strategies that could help alleviate the potential crisis of a shortage of organic inspectors and reviewers, and also posed questions to stakeholders about additional strategies and appropriate ways for NOP to assist with financial burdens. NOSB received a substantial amount of public comment on this topic representing overwhelming support for programs and resources to support organic inspectors across a range of issues. All comments acknowledged that there is a lack of inspector pool and many cited travel times as a major contributing factor. Many commenters also acknowledge the lack of apprenticeships as a critical bottleneck in the pipeline for bringing new inspectors into the pool. Comments suggested that inspections be conducted based on risk to reduce the number of inspections needed and to focus highly qualified inspectors on fewer (but more in-depth) inspections. NOSB voted unanimously to adopt the proposal. Shortly after the NOSB Meeting, NOP launched a [new funding opportunity](#) to support and expand the pool of qualified inspectors and reviewers. NOP will fund projects aimed at organic inspector and reviewer workforce development, recruitment, and retention. Application deadline is July 2.
- **HUMAN CAPITAL: SUPPORTING THE WORK OF THE NOSB (DISCUSSION):** The Subcommittee is exploring opportunities to obtain outside assistance for NOSB work, as appropriate, to help alleviate some of the workload without compromising the integrity of the process or the independent nature of the production and deliberation of its proposals. NOSB members are volunteers and the job of a NOSB member is demanding and takes time away from the members' other work. Providing more support is key to achieving a more inclusive and diverse Board. Commenters wholly agreed that NOSB members should receive support to conduct their duties, but retaining independence is of utmost importance (e.g. preventing undue influence from NOP; retaining independent interpretations and decision-making). Commenters brainstormed solutions for utilizing budgets, outlining appropriate qualifications of support providers, and identified specific scopes where support is needed (technical and legal support was most mentioned). [\[Read OTA's spring 2021 comments on Supporting Work of NOSB\]](#)

CROPS SUBCOMMITTEE

- **PAPER PLANT POTS AND OTHER PAPER-BASED PRODUCTION AIDS (PROPOSAL):** Paper planting pots have been petitioned for inclusion on the National List as an allowed input. Paper pots and other growing container and production aids are used to support seeding, growing and/or transplanting in the field and are intended to remain in the soil. The Crops Subcommittee has worked diligently over several meetings to craft a definition for 205.2 and a listing annotation for 205.601 that capture the detailed composition metrics of paper-based planting aids that meet the needs of organic producers and product manufacturers, while complying with Organic Food Production Act criteria for the National List. Most commenters are in favor of passing the proposal as presented at this meeting. A number of commenters identified technical corrections that still need to be made to the proposed definition, but these are considered non-substantive. NOSB will communicate to NOP through a cover letter the specific edits that need to be made to the definition that will ensure clarity and consistent implementation without changing the Board’s fundamental intent. NOSB voted unanimously to pass the motions for the definition of paper-based planting aids at 205.2 and the motion for a new listing and annotation at 205.601. [\[Read OTA’s Spring 2021 comments on Paper Based Planting Aids\]](#)
- **BIODEGRADABLE BIOBASED MULCH ANNOTATION CHANGE (PROPOSAL):** Biodegradable biobased mulch film is currently listed on the National List of allowed materials for crop production as a weed barrier and a key alternative to non-recyclable plastic mulch. However, no commercially available products meet the regulatory terms of allowance such as being 100% biobased. The Subcommittee proposed a minimum requirement of 80% biobased content for biodegradable mulch films, which is the same minimum requirement proposed for paper-based planting aids although there are still no commercially available products that currently meet that threshold. Commenters were overwhelmingly in support across many stakeholder sectors (with some exceptions) for an annotation change to allow less than 100% biobased content so that these products have a chance at becoming viable alternatives to standard plastic films. Some commenters argued that more research is needed before permitting these inputs due to concerns about environmental impact of residual microplastics left in the soil. Also, commenters questioned the language used in the proposed annotation regarding continuous improvement from 80% biobased towards 100% when available, and the Subcommittee agrees that the language need more work. NOSB voted (14-0) to send the proposal back to Subcommittee for further work. An updated proposal is expected for vote at the fall 2021 meeting. [\[Read OTA’s spring 2021 comments on Biodegradable Mulch\]](#)
- **AMMONIA EXTRACT (DISCUSSION):** Ammonia extract has been petitioned for inclusion on the National List as a prohibited input in organic crop production. Synthetic ammonia fertilizers are already prohibited, and this petition will challenge the allowance of ammonia that is isolated, captured, extracted, and/or concentrated from natural sources such as manure through physical, mechanical, and/or biological processes that are ultimately classified as nonsynthetic. A large number of comments were submitted on this topic. Many questioned whether the definition of “ammonia extract” as proposed in the petition is overly broad and could encompass any product that contains some amount of ammonia including long-time allowed and commonly accepted inputs. NOSB members found this to be a valid criticism, and may consider narrowing the definition, perhaps based on whether the extracted ammonia retains carbon from the original material. All commenters emphasized the need for farmers using these materials to comply with soil health-building practices in the standards. Commenters supplied scientific references about the soil health and biodiversity impacts from using ammonia extracts. NOSB is parsing out the different impacts from purified ammonia versus concentrated forms containing organic carbon. Some concerns were raised in comments about the compatibility with international norms, e.g. countries that take issue with certain highly soluble nitrogen inputs. Comments raised broader questions about the compatibility of any highly soluble fertilizers with organic principles. NOSB members engaged in a

thoughtful discussion of the comments received, some members being opposed, some in favor, some open to compromise through a restrictive definition or annotation. The issue of fraud is a focus of the petition but was not addressed much in the NOSB's live discussion. NOSB members feel that certifiers and Material Review Organization are sufficiently addressing the concerns through additional testing, batch tracking, and unannounced inspections. [\[Read OTA's Spring 2021 comments on Ammonia Extract\]](#) [\[Read The Organic Center's Comments on Ammonia Extract\]](#) ****OTA Member Opportunity – contact jmirenda@ota.com to participate in a member task force on ammonia extract.**

- **KASUGAMYCIN (DISCUSSION):** Kasugamycin is an antibiotic that has been petitioned for allowance to control fire blight in apples, pears, and other pome fruits. The concern of antibiotic resistance was a significant topic expressed in public comments. Many comments indicate that consumers do not want antibiotics in their organic food supply, especially given the decision from NOSB several years ago to prohibit previously-allowed streptomycin and tetracycline as antibiotics for fire blight control. Organic apple producers from across the country commented in the need for tools to control this devastating disease, and are challenged to find effective alternatives without compromising consumer expectations. NOSB members suggested that consumers need to receive clear communication about the complexity of these issues and what farmers are up against.

- **2023 SUNSET REVIEWS:** The following substances are currently on the National List and are undergoing Sunset Review this year. At this meeting, NOSB received public comments and discussed these substances (brief summaries below). NOSB will utilize these comments, as well as comments received in advance of the fall meeting, before voting at the fall 2021 meeting on whether these substances should remain listed. [\[Read OTA's Spring 2021 comments on Crop Sunset Review\]](#).
 - **Copper sulfate** (aquatic rice systems) – Most comments supporting relisting came from current organic rice growers. It is clear that removing this material would do great damage to organic rice growers. Other commenters asked for more specificity in the annotation and/or need to move on with continuous improvement.
 - **Ozone gas** (irrigation system cleaner) – Commenters are overwhelmingly in support of relisting this material.
 - **Peracetic acid** (disinfectant, disease control) – No concerns or questions raised about this material.
 - **EPA List 3 Inerts** (passive pheromone dispensers) – Commenters widely support continued allowance. These inerts are critically important to controlling pests in many crops. Many commenters reiterated concerns about the defunct EPA List 3 and List 4. There only a handful of List 3 substances that are actually used in passive pheromone dispensers, so individual listing on the National List could be a viable option to explore. NOP confirms that inerts are on its “critical priorities” list, and the Advance Notice of Proposed Rulemaking on Inerts is forthcoming. [\[Read OTA's Spring 2021 comments on EPA List 3 Inerts\]](#) ****OTA Member Opportunity – contact jmirenda@ota.com to join member task force on inerts.**
 - **Chlorine materials: Calcium hypochlorite, Chlorine dioxide, Hypochlorous acid, Sodium hypochlorite** – NOSB also discussed chlorine in the Livestock and Handling Subcommittees and their discussion generically cover all crop, livestock, and handling uses. The environmental and health concerns from chlorine are acknowledged and are being balanced with the need to have a clean and safe food supply.
 - **Magnesium oxide** (viscosity control in humates) – Commenters indicated support for relisting of this material.
 - **Calcium chloride** (foliar spray for physiological disorders) – Commenters indicated lots of support for relisting of this material, mostly due to the importance of having a foliar application alternative to addressing calcium deficiencies that cannot be addressed by soil applications.
 - **Rotenone** (prohibited) – Commenters support relisting as a prohibited material.

HANDLING SUBCOMMITTEE

- **ION EXCHANGE FILTRATION (PROPOSAL):** Ion exchange filtration is a food processing technique used to facilitate removal of impurities from a liquid using a chemical exchange process. NOSB presented a proposal at this meeting in response to a request from NOP for recommendations related to the use of ion exchange resins/membranes and recharge materials and which of these types of substances need to be included on the National List. The Subcommittee proposal is that recharge materials need to be included on the National List, which was widely supported by public commenters and is already the current practice of certifiers. The Subcommittee's proposal on resins is contingent on obtaining a legal interpretation of how the FDA definitions of secondary food additives and food contact substances pertain to resins; NOP failed to provide this legal information to NOSB in advance of this meeting. There was some discussion about whether this should be sent back to Subcommittee for further work, but NOP can't guarantee that the additional information could be obtained in a timely manner. NOSB deferred the vote until the last day of the meeting. A motion to send the proposal back to subcommittee failed to pass (4 yes, 10 no). NOSB agreed to pass the proposal as presented at this meeting and also add a cover letter to NOP that will outline the specific information that is still needed. Specifically, NOSB is looking for legal interpretation on whether or not resins are food contact substances or direct food additives and how they align with the NOP definition of processing aids. The expectation is that NOP will provide this information back to the Board at which time NOSB can consider if additional discussion or proposal development is needed. NOSB passed a motion to adopt the proposal unanimously. [\[Read OTA's Spring 2021 comments on Ion Exchange\]](#)
- **ZEIN (DISCUSSION):** Zein (corn protein) has been petitioned for allowance as a non-organic ingredient for use in organic food processing as a food coating. Comments were submitted on this topic and none were in favor of adopting the petition. Commenters said there is not a need for this non-organic ingredient, and also raised general opposition to preservatives used specifically for increasing shelf life. NOSB is considering whether allowing non-organic versions would incentivize or disincentivize the development of organic-compliant forms of zein that do not involve the use of sulfur dioxide in the wet milling process. [\[Read OTA's Spring 2021 comments on Zein\]](#)
- **FISH OIL ANNOTATION (DISCUSSION):** The Subcommittee is exploring options for how to annotate the listing of fish oil on 205.606 to ensure sourcing only from fish that are sustainable or not endangered. Three options were presented in the discussion document. Most commenters indicated stronger support for Options 1 and 2, although there are still concerns that need to be ironed out for each of these options to ensure clarity and consistency in implementation. NOSB members and commenters also acknowledged that if NOP had implemented the NOSB recommendations for aquaculture, it would make this work agenda item moot because the annotation could just require oil from organic fish.
- **2023 SUNSET REVIEWS:** The following substances are currently on the National List and are undergoing Sunset Review this year. At this meeting, NOSB received public comments and discussed these substances (brief summaries below). NOSB will utilize these comments, as well as comments received in advance of the fall meeting, before voting at the fall 2021 meeting on whether these substances should remain listed. [\[Read OTA's spring 2021 comments on Handling Sunset Review\]](#)
 - **Agar-Agar** (gelling agent, emulsifier, thickener) – Some commenters indicated availability of nonsynthetic forms, and even certified organic forms, although it is unclear if the supply is sufficient to warrant removal of this listing. Commenters also flagged the concern for environmental

conservation in the harvesting of marine materials for this purpose.

- **Animal enzymes** (rennet, catalase, lipase, pancreatin, pepsin, trypsin) – Commenters indicate lack of sources from organic animals and NOSB seeks to better understand the barriers to developing certified organic supply chains for these materials. NOSB is also looking for information on ancillary substances used in rennet and egg white lysozyme as these are not covered in the technical report.
- **Calcium sulfate** (coagulant, conditioner, firming agent) – Commenters identified essential uses for coagulation of bean curd but were unclear about other current uses. NOSB is interested in receiving more information about environmental impacts of mining to source this material.
- **Carrageenan** (gelling agent, emulsifier, thickener) – Public comments were mostly in favor of relisting, with some identifying specific products for which the material is essential and alternatives are not available. NOSB plans to look carefully at any new information on health and safety in advance of the next meeting, as this was a focus of past Sunset Reviews.
- **Glucono delta-lactone** (coagulant) – NOSB is looking for more comments from stakeholders about the essentiality of this material and whether there are alternatives available.
- **Tartaric acid** (acidulant) – Commenters indicate the lack of sources from organic wine and NOSB seeks to better understand the barriers to developing certified organic supply chains for this material. NOSB is also looking to better understand the variable that influence the circumstances and frequency when tartaric is needed to adjust pH.
- **Cellulose** (regenerative casings, anti-caking agent, filtering aid) – Commenters indicate this material is essential and support its relisting.
- **Chlorine materials: Calcium hypochlorite, Chlorine dioxide, Hypochlorous acid, Sodium hypochlorite** – NOSB also discussed chlorine in the Livestock and Handling Subcommittees and their discussion generically cover all crop, livestock, and handling uses. The environmental and health concerns from chlorine are acknowledged and are being balanced with the need to have a clean and safe food supply. Commenters encouraged NOSB to take up this topics as a research priority, outside of the Sunset Review, and to explore the possibility of setting up a regulatory framework for a hierarchical practice standard that encourages use of least toxic inputs first and/or establishing a separate section of the National List specific to sanitizers and disinfectants.
- **Potassium hydroxide** (pH adjuster) – Many commenters indicate that this material is essential and support relisting.
- **Silicon dioxide** (defoamer) – Many commenters indicate this material is essential and support relisting.
- **Potassium lactate** (antimicrobial agent, pH regulator) – Most commenters are in support of relisting.
- **Sodium lactate** (antimicrobial agent, pH regulator) – Most commenters are in support of relisting.

LIVESTOCK SUBCOMMITTEE

- **RESOLUTION ON ANIMAL WELFARE RULE:** NOSB voted unanimously in support of a resolution calling for immediate implementation of the Organic Livestock and Poultry Practices (OLPP) rule that was finalized in 2017 but subsequently withdrawn in 2018. The resolution urges USDA to re-issue the rule with policy considerations related to outdoor access and space requirements as established in 2017 without further delay. The resolution was sparked by Secretary Vilsack a few weeks prior suggesting that USDA was going to “start from scratch” on the OLPP rule. NOSB members felt it critical to rebuke that sentiment and reaffirm the past work of the NOSB and NOP to develop recommendation and conduct rulemaking on this critical issue of animal welfare. The full text of the resolution reads,

“On April 21st, 2017 the National Organic Standards Board unanimous to pass a resolution requesting the implementation of the Organic Livestock and Poultry Practices rule.

The National Organic Standards Board recognizes that consumers’ trust of the organic label and industry growth depends on the strength and consistent application of the organic regulations. NOSB has an integral role in advising USDA in its promulgation of these voluntary standards and strives to seek consensus among organic stakeholders in its recommendations to USDA and the secretary. The Organic Livestock and Poultry Practices rule, finalized in 2017 and subsequently withdrawn in 2018, was based on a unanimous NOSB recommendation to USDA in 2011. The NOSB recommendation was the product of a decade of public NOSB meetings, lengthy discussions, public comment periods and consultation from organic producers, processors, consumers, and the veterinary and scientific community. Both the NOSB recommendation and the final rule issue by Secretary Vilsack in 2017 defined appropriate requirements for space, density and outdoor access in organic poultry production. Support for this rule has been expressed through public comment by major and growing organic brands. The rule is supported by organic producers, consumers, the industry, and the NOSB. The policy received over 120,000 supportive comments in the *Federal Register* representing over 99% of commenters. The NOSB stands by its 2011 recommendation to USDA on the organic livestock and poultry practices policy questions.

Therefore, be it resolved by unanimous vote, the National Organic Standards Board—as USDA’s Federal Advisory Board on organic issues and representing organic farmers, ranchers, processors, retailers and consumers—urges the Secretary to re-issue as final the Organic Livestock and Poultry Practices rule with policy considerations related to outdoor access and space requirements as established in 2017 without further delay.

Though 4 years have passed since 2017, the Board, and the organic community, remain unified in our call for implementation of OLPP. Today we vote again, as a unified board, and ask for the immediate implementation of the Organic Livestock and Poultry Practices rule.”

- **2023 SUNSET REVIEWS:** The following substances are currently on the National List and are undergoing Sunset Review this year. At this meeting, NOSB received public comments and discussed these substances (brief summaries below). NOSB will utilize these comments, as well as comments received in advance of the fall meeting, before voting at the fall 2021 meeting on whether these substances should remain listed. [[Read OTA’s Spring 2021 comments on Livestock Sunset Review](#)]
 - **Activated charcoal** (adsorbent) – Public comments indicate this material is necessary and should be relisted. No viable alternatives were identified.
 - **Calcium borogluconate** (milk fever treatment) – Public comments indicate this material is necessary and should be relisted. The listing of electrolytes might be redundant but retaining this listing will reduce confusion. NOP consultation confirms that this substance is not in conflict with FDA regulations.
 - **Calcium propionate** (milk fever treatment) – Farmers submitted comments that this is an essential material and for saving the lives of animals suffering from milk fever.
 - **Chlorine materials: Calcium hypochlorite, Chlorine dioxide, Hypochlorous acid, Sodium hypochlorite** – For livestock use, chlorine materials are

critical for regularly sanitizing dairy equipment and milk contact surfaces. NOSB also discussed chlorine in the Livestock and Handling Subcommittees and their discussion generically cover all crop, livestock, and handling uses. The environmental and health concerns from chlorine are acknowledged and are being balanced with the need to have a clean and safe food supply. See Handling Subcommittee for additional notes.

- **Kaolin pectin** (adsorbent, antidiarrheal, gut protectant) – Public comments indicate this material is necessary and should be relisted. There was some discussion about the different situations when one would use kaolin pectin versus activated charcoal.
- **Mineral oil** (intestinal compaction treatment) – Public comments indicate this material is necessary and should be relisted. Material review organizations raised questions about whether it can be administered orally and/or rectally.
- **Injectable nutrient supplements** – Public comments indicate this material is necessary and should be relisted.
- **Propylene glycol** (ketosis treatment) – Public comments indicate support for this material and a lack of safe and effective alternatives. Commenters refer to this as the gold standard of ketosis treatment.
- **Acidified sodium chlorite** (teat dip) – Some comments in support but NOSB is hoping to receive more comments in the fall in advance of the vote on this material.
- **Zinc sulfate** (hoof treatment) – Most commenters were supportive of relisting this material. Few commenters raised concern about manufacturer and disposal of this material, and suggested an annotation to address environmental impacts.

MATERIALS SUBCOMMITTEE

- **2021 RESEARCH PRIORITIES (DISCUSSION):** NOSB presented its annual list of research priorities for organic food and agriculture. Many commenters submitted feedback in support of the topics included in the list, and made suggestions for additional topics such as: Chlorine research (sanitizers generally), Biodegradable Mulch, Ecosystem services, Planting stock development, etc. The NIFA presentation at the beginning of the NOSB Meeting gave NOSB helpful advice on how to structure their priorities list – keep it comprehensive and inclusive, don't need to cut it down or prioritize certain topics within the overall list. NOSB members discussed how they could receive technical papers or literature review on research topics in more a timely manner so the information can inform their work on related active work agenda items. [\[Read The Organic Center's Spring 2021 comments on NOSB Research Priorities\]](#)
- **EXCLUDED METHODS (DISCUSSION):** NOSB has been working for several years to establish guidance for interpreting the excluded methods provision of the organic regulations. The discussion document presented for this meeting summarized the key milestones of past NOSB recommendations and set to prioritize the upcoming work plan. Commenters were unanimous in their call for USDA to implement the 2016 NOSB Recommendation into formal guidance to establish definitions, principles, and criteria to ensure consistent implementation of the excluded methods definition across a number of emerging technologies. The organic seed community stressed the importance of this issue for strengthening organic seed availability and usage. The “to be determined” list of technologies is still critical in the eyes of stakeholders, and needs to be advanced at the next NOSB meeting. [\[Read OTA's Spring 2021 comments on Excluded Methods\]](#)

2021 SPRING NOSB VOTING CHART

14 voting members were present at this meeting. Unless otherwise noted below, there were no other absences, abstentions or recusals. Recommendations are not effective until accepted by USDA and implemented through rulemaking. Two-thirds majority is needed to pass motions, except that a simple majority is needed to refer proposals back to subcommittee.

SUBCOMMITTEE	AGENDA ITEM	MOTION & FULL BOARD VOTE	OUTCOME AND NEXT STEPS
CROPS	Paper-Based Crop Planting Aids	Motion add to add proposed definition of paper-based crop planting aid to 205.2. 14 Yes, 0 No. Motion passes. Motion to add proposed listing to 205.601. 14 Yes, 0 No. Motion passes.	PASSED: A recommendation for rulemaking will be referred to USDA.
CROPS	Biodegradable Biobased Mulch Film	Motion to refer proposal back to Subcommittee. 14 Yes, 0 No. Motion passes.	The proposal will be referred back to Subcommittee for further work.
HANDLING	Ion Exchange Filtration	Motion to adopt the proposal. 14 Yes, 0 No. Motion passed.	PASSED: The proposal will be referred to USDA for consideration.
COMPLIANCE, ACCREDITATION, CERTIFICATION	Human Capital: Strategy for Recruitment and Talent Management of Organic Inspectors and Reviewers	Motion to adopt the proposal. 14 Yes, 0 No. Motion passed.	PASSED: The proposal will be referred to USDA for consideration.
LIVESTOCK	OLPP Resolution	Motion to adopt the resolution on OLPP Rule. 13 Yes, 0 No, 1 Absent. Motion passes	PASSED: The resolution is adopted and will be referred to USDA.

National List References: §205.601 = allowed synthetics for crops / §205.602 = prohibited non-synthetics for crop / §205.603 = allowed synthetics for livestock / §205.604 = prohibited non-synthetics for livestock / §205.605(a) = allowed non-agricultural non-synthetics for processing/handling / §205.605(b) = allowed non-agricultural synthetics for processing/handling / §205.606 = allowed agricultural for processing/handling

LOOKING AHEAD TO FALL 2021 MEETING

The [fall 2021 NOSB Meeting](#) is scheduled for October 19-21 in Sacramento, CA. Work agenda topics are listed below. Items that are expected to be presented as proposals for vote rather than discussion are indicated within the table.

SUBCOMMITTEE	ACTION	FALL 2021 NOSB WORK AGENDA TOPIC
CAC	Discussion	Human Capital Management – evaluating options for supporting the work of the NOSB
Policy	Discussion	Review of the Policy and Procedures Manual – public comment process
Materials	Vote	Excluded Methods – evaluating new technologies against existing definition of excluded methods
Materials	Vote	Tall Oil, Distilled – petition to allow as an inert ingredient in crop and livestock pest controls
Materials	Vote	NOSB 2021 Research Priorities – evaluating research priorities for the organic food and agriculture sector

SUBCOMMITTEE	ACTION	FALL 2021 NOSB WORK AGENDA TOPIC
Crops	Vote	Biodegradable biobased mulch film – proposal to amend current definition and restrictions
Crops	Vote	Chitosan – petitions (2) for use as plant disease control and as coagulant for fertilizer
Crops	Vote	Biochar – petition for use of cow-manure derived biochar as a soil amendment
Crops	Vote	Ammonia extract – petition to prohibit non-synthetic ammonia extract fertilizers
Crops	Vote	Kasugamycin – petition to allow for control of fire blight disease
Crops	Vote	Hydronium – petition for use as pH adjuster in the production of dehydrated manure fertilizers
Crops	Vote	Lithothamnion – respond to NOP request for information on the classification as agricultural and eligibility for wild crop certification
Crops	Discussion	Carbon Dioxide – petition for use as an irrigation water pH adjuster
Crops	Vote	2023 Sunset Reviews: Copper sulfate (algicide, tadpole shrimp control, disease control), Oxone gas (irrigation system cleaner), Peracetic acid (disinfectant, disease control), EPA List 3 Inerts (passive pheromone dispensers), Calcium chloride (foliar spray for physiological disorders), Chlorine materials: Calcium hypochlorite, Chlorine dioxide, Hypochlorous acid, Sodium hypochlorite (sanitizer, disinfectant), Magnesium oxide (viscosity control in humates)
Handling	Vote	Cetylpyridinium chloride (CPC) – petition for use as an antimicrobial processing aid for poultry processing
Handling	Vote	Phosphoric acid – petition to allow for use as a pH adjuster for extractions of plants of the Lamiaceae family
Handling	Vote	Zein – petition for use as a processing aid and glaze in food handling
Handling	Vote	Peroxlactic Acid (PLA) – petition for use as an antimicrobial processing aid for meat and poultry products
Handling	Vote	Fish oil – prohibition of fish caught directly for the sole use of its oil and from species and regions that are overfished or exploited
Handling	Vote	L-Malic acid – reclassification as synthetic
Handling	Vote	2023 Sunset Reviews: Agar-Agar (gelling agent, emulsifier, thickener), Animal enzymes (catalysis for biological processes, e.g. rennet for cheese production), Calcium sulfate (tofu coagulant), Carrageenan (gelling agent, emulsifier, thickener), Glucono delta-lactone (tofu coagulant), Tartaric acid (acidulant), Cellulose (regenerative casings, anti-caking agent, filtering aid), Chlorine materials: Calcium hypochlorite, Chlorine dioxide, Hypochlorous acid, Sodium hypochlorite (sanitizer, disinfectant), Potassium hydroxide (pH adjuster), Silicone dioxide (defoamer), Potassium lactate (antimicrobial agent, pH regulator), Sodium lactate (antimicrobial agent, pH regulator)
Livestock	Vote	2023 Sunset Reviews: Activated charcoal (adsorbent), Calcium borogluconate (milk fever treatment), Calcium propionate (milk fever treatment), Chlorine materials: Calcium hypochlorite, Chlorine dioxide, Hypochlorous acid, Sodium hypochlorite (sanitizer, disinfectant), Kaolin pectin (adsorbent, antidiarrheal, and gut protectant), Mineral oil (intestinal compaction treatment), Nutritive supplements (injectable vitamins and minerals), Propylene glycol (ketosis treatment), Acidified sodium chloride (teat dip), Zinc sulfate (hoof treatment)

About the Organic Trade Association’s NOSB Report: As a service to its members, the Organic Trade Association attends National Organic Standards Board meetings. The *NOSB Report*, a member publication, summarizes the meeting and provides an overview of the agenda topics, public commentary, and key decisions made by NOSB. The items included in this report represent recommendations that NOSB developed and reviewed at its meetings. If accepted by the Board, recommendations pass to the National Organic Program, which determines the final form of the NOSB recommendations. Our members are alerted to steps in rulemaking through our *News Flash* or other member communications. Archives of our *NOSB Report* are available on our website. Please contact [Gwendolyn Wyard](#), OTA’s Vice President of Regulatory and Technical Affairs, or [Johanna Miranda](#), OTA’s Farm Policy Director, for more information.