

National Organic Standards Board
Certification, Accreditation, Compliance Subcommittee (CACS)
Oversight Improvements to Deter Fraud: Consistent Location Identification Proposal
August 1, 2023

Intro:

Since the fall of 2022, the Certification, Accreditation, Compliance Subcommittee (CACS) has received feedback from the community that parcel location collection is inconsistent across NOP accredited certifiers. While some certifiers have a complete database of the location of every parcel they certify, other certifiers have no ability to independently verify the location and boundaries of the fields they certify based on the information they collect from their clients. The CACS heard from stakeholders across the community that generally there is consensus that a consistent, industry-wide standard parcel location collection system would boost certifiers' ability to verify information and more effectively monitor those parcels they certify.

At the spring 2023 National Organic Standards Board (NOSB) meeting, public commenters requested clarification on how the CACS defined a parcel of land. Certifiers use various names such interchangeably: sites, fields, and parcels. For the purpose of this proposal the CACS is defining "parcel" as the legal parcel included within the boundaries of the legal property lines for that unit of land. The CACS acknowledges that farmers may subdivide their legal parcels into sub-field designations.

The CACS recommends that NOP provide guidance to certifiers that all parcels should be located via GPS, and it will be the responsibility of the certifier and inspector to coordinate the intake of information to meet this requirement. The goal of this guidance is database consistency.

Challenge:

The location of certified organic operations, including each production parcel, must be more consistently recorded and managed across certifiers. This challenges the industry, leading to a gap in certifiers' ability to accurately cross-check the operations and fields they certify with other certifiers. Furthermore, some certifiers cannot conduct independent verification or unannounced inspections of fields because they don't have mapping capabilities of all field locations.

Solution:

Certifiers located both domestically and internationally can harmonize the data intake from clients when producers request to certify new fields for organic certification. By requesting the geolocation or information that can lead to geolocation information (Global Positioning Coordinates, parcel identification numbers, street address, etc.) of certified operations, certifiers will be able to receive consistent data that is easily managed while also allowing the inspectors to confirm the accuracy of the data during the inspection and use it as a cross-check.

Background:

The Strengthening Organic Enforcement (SOE) rule will make supply chain tracebacks and mass balances mandatory. Complete supply chain tracebacks will require certifiers to work bi-directionally up and down the supply chain in cooperation with other certifying bodies.

In addition to the SOE, the [USDA Organic Transition Initiative](#) currently being rolled out across the US discusses ways to improve existing programs that support organic transition and markets. Consistency of certified operation location identification and verification of land eligibility is essential. It can be accomplished by requiring geolocation data for all certified operations.

Applications for certification for a new field typically include a name for the field and the number of acres. Some certifiers also request the address or driving directions. Still, many certifiers confirmed that if asked, they could not locate each field they certify via google maps or other interactive GPS database . This lack of data impedes certifiers' ability to act quickly in the case of aggregated mass balance investigations across clients or in the case of a major contamination event.

Consistent Location Identification:

Consistency in parcel identification and location should be required to comply with the SOE-mandated supply chain traceback requirements.

In the Fall of 2021, the NOSB received the following comment/question regarding the proposed rule on Strengthening Organic Enforcement (SOE): "Will the final rule require mandatory data reporting to NOP by crop type, acreage, and location; and a number of animals by livestock type and location, at least on an annual basis to the Organic Integrity Database (OID)? A requirement for certifying agents to report production area certified by crop/livestock and location, on at least an annual basis, to the OID is one of the most impactful single actions that can be taken to increase integrity in the global organic control systems." This commenter's question provided a road map for CACS.

1. At the Fall 2022 NOSB meeting, the proposal, "Oversight Improvements to Deter Fraud: Acreage Reporting," was unanimously passed by the Board.
 - a. The key aspect of the recommendation was a balance and cross-check to ensure that the volume of certified acres (under the NOP) ultimately supports the volume of organic products produced and sold (under the NOP).

2. At the Spring 2023 NOSB meeting, the discussion document "Oversight Improvements to Deter Fraud: Consistent Location Identification" received public comment and was discussed by the NOSB. For the Fall 2023 NOSB meeting, the community will review a proposal with the same topic, and the NOSB will vote on it.
 - a. The proposal aims to establish the structure and system for universal field location identification for organic producers, certifiers, inspectors, and the NOP, to register, verify, and cross-check the location of all acres certified under the NOP, both domestically and internationally.

The Strengthening Organic Enforcement (SOE) Rule:

The SOE states, "Certifying agents must be able to conduct unannounced inspections of any operation they certify. Therefore, AMS requires that certifying agents only accept applications for certification or continue certification from operations for which the certifying agent can conduct unannounced inspections. To ensure consistency, transparency, and accountability, certifying agents are expected to describe the areas where they operate in the written materials they provide to applicants and certified operations and review the locations of all operations during their application or annual review. A certifying agent that cannot conduct unannounced inspections in an applicant's or certified operation's location due to logistical challenges, staffing, security, or other reasons, is considered not to have the administrative capacity for certification activities in that area, consistent with § 205.501(a)(19)".

As one commenter mentioned, "The Strengthening Organic Enforcement Rule should reduce the risk of fraud in the organic marketplace. However, enforcement efforts depend upon sufficient and accurate information about each operation." A consistent process for locating certified organic operations, including fields, would aid in executing parts of the SOE, including cross-checking and supply chain verification.

An additional certifier commenter stated, "Geolocation will enable greater ease in organic oversight across certifiers and supply chains by applying fixed, traceable, and universally understood markers on individual plots of land that will not change over time."

History, Evolution, and Benchmarking of Geo-Referencing Information:

1. **Global Navigation Satellite Systems (GNSS) and Global Positioning Systems (GPS)** - In the 1970s, the United States military began using a form of GNSS called GPS for navigation, which became publicly available in the early 2000s.
 - a. GPS allows for navigation to any point of interest, anywhere in the world.
 - b. According to [GPS.gov](https://www.gps.gov), "GPS is a U.S. - owned utility that provides users with positioning, navigation, and timing (PNT) services.....24 operating satellites are transmitting one-way signals that give current GPS satellite position and time." GPS is generally expressed as specific latitude and longitude coordinates
 - c. Russia, China, and the European Union also have a GNSS similar to GPS.
 - i. Japan and India have regionally based systems.
 - d. The GPS is the oldest of all the GNSS.
 - i. [GPS.gov](https://www.gps.gov) states, "the American taxpayer pays for the GPS service enjoyed throughout the world. All GPS program funding comes from general U.S. tax revenues....there are no plans to privatize GPS, as US Law and policy require the civil GPS service to be provided free of direct user fees."
 - ii. One commenter highlighted that three certifiers are currently requesting GPS coordinates (CCOF, OOTC, and WSDA), with several other certifiers requesting GPS coordinates from international operations that are certified to NOP standards.
2. **Keyhole Markup Language (KML) and Keyhole Markup Language Zipped (KMZ)**
 - a. [KML](#) is a file responsible for storing map locations that can be viewed with the following:
 - i. Geographical Information Systems (GIS) such as ArcGIS
 - ii. Geospatial Tools such as Google Earth Pro
 - b. [KMZ](#) is a Zip-compressed version of a KML
 - i. One commenter highlighted that KMZ files, which display field shapes and acreages, are maintained in WSDA's database.

The precedence of geo-referenced data is found within the USDA currently:

1. **Risk Management Agency (RMA):**
 - a. Having exact location information provides enhanced transparency and oversight. The Risk Management Agency's General Standards Handbook Section 1.c. of the Maintaining Organic Records states, "a requirement for organic producer's record keeping is that "insured must have, e.g., aerial or GIS (Geographical Information System) maps, from the organic farming operation that show the exact location of each field for certified organic, transitional, buffer zone, and conventional acreage not maintained under an organic practice."
2. **Certifier Community + Neighbors to the South:**
 - a. Several Certifiers are already collecting town, range, and section (TRS) data with others using "GPS Coordinates." How can those certifiers share with other ACAs their intake process?

- b. One certifier creates a KMZ, in Google Earth Pro, for every "site" (synonymous with field or parcel). The business provides location and latitude/longitude; inspectors verify that info and create a KMZ file.
- c. Several certifiers require GPS coordinates for all farms outside of the USA that are certified to the NOP standard.
 - i. A public commenter mentioned that “the practice of incorporating and tracking GPS coordinates, whether as degrees-minutes-seconds or digital coordinates, is universal among those certifiers that are accredited to the Mexican “Ley de Productos Orgánicos” Standard (LPO), as the practice is already required under that standard.”

Low Burden - One-Time Collection:

By requiring a consistent method of location identification information through GPS coordinates, it will be easy and low-burden to achieve consistency across all geographic locations, domestic and international. The information can be easily obtained once and then used from that point forward for organic operations that do not have access to this information. GPS is free and accessible globally and can be the logical path forward for consistently capturing location information domestically and internationally. According to two certifiers, via the public comment process, the burden is low and outweighed by improved resolution. Additionally, a certifier went on to state that the “benefits will be seen internally for each certifier with greater long-term visibility and tracking on field data and management and that the use of geolocation will enable greater ease in organic oversight across certifiers and supply chains by applying fixed, traceable, and universally understood markers on individual plots of land that will not change over time.”

GPS proposed framework for location information:

1. One GPS coordinate (including latitude and longitude) for identification of each location, such as a certification office, brokerage or importer office, manufacturing facility, handling facility, field, production unit - a field in a grower group, etc.
 - a. A GPS coordinate in the center of the field can be a best practice.

Spring 2023 Discussion Summary:

During the Spring 2023 meeting, the NOSB discussed the Consistent Location Identification discussion document and reviewed public comments, which involved answering several questions regarding collecting field-level location information and verification methods.

The inspector community that commented was in complete support of requiring more consistent methods of field location information. Inspector comments from the Spring of 2023 consistently confirmed the challenge. They even stated, “The pandemic presented an opportunity to test the ability to verify the location of a field without the operator being available. In the best case - each field has an address & each address maps to the frontage of the field, and in the worst case - a field without means to navigate to and/or a hand-drawn or low-quality map with indistinguishable features, often due to having been faxed and/or copied too many times. In these cases, there is practically no way to identify where a field is located without the operator. Most fields can be found eventually, but only after extensive effort and significant time.” The NOSB is requesting that we commit as a community to solving this easy challenge, so inspectors have more time to find the fraud versus spending time finding the field.

The NOSB reviewed comments from members of the community, including certifiers that wanted to ensure clarity of the information; through public comments and NOSB discussion, clarity was received, and a summary is listed below:

1. Several members noted that trying to keep GPS locations updated for diverse and small farms is difficult.
 - a. Once the farm is located, GPS, a standardized system, doesn't deviate and doesn't need to be continuously updated by the operation.
 - i. This recommendation does not require annual GPS information for each crop nor does it require details such as row feet.
 - b. The macro field border or parcel does not change based on crop production, the type of crop, or how a producer segments the field or parcel. The recommendation is for the macro border of each field or parcel, not how a producer segments out the field or parcel to grow crops.
 - c. Should GPS coordinates be unavailable due to technology access or other barriers, the following suggestions based on public comment should be used as acceptable alternatives as all three ways, with additional steps, will lead to GPS-coordinate capture.
 - i. Parcel numbers (standard property identifiers that each county recognizes)
 - ii. Address (not mailing route such as Rt 2 Box 176, but a street address if applicable)
 - iii. Legal address including Section / Township / Range

Recommendation:

The CACS recommends that the NOP provide guidance to all accredited certifiers to obtain consistent location information (geocodes) that can lead to GPS coordinates of all applicants for certification and certified operations (parcels, production units - grower groups, handling locations, importers, brokers, etc.). This will result in harmonization of location data of all parcels enabling certifiers to streamline cross-checks and share information internally between operator, certifier, and inspector..

Vote in Subcommittee:

Motion to accept the proposal on Oversight Improvements to Deter Fraud: Consistent Location Identification

Motion by: Amy Bruch

Seconded by: Nate Powell-Palm

Yes: 9 No: 0 Abstain: 0 Recuse: 0 Absent: 0