National Organic Standards Board Handling Subcommittee Petitioned Material Discussion Document Magnesium Carbonate August 1, 2023

Summary of Petition [Magnesium carbonate petition]:

This document reviews the petitioned use and addition of magnesium carbonate as a processing aid to the National List at 7 CFR 205.605: Nonagricultural (non-organic) substances allowed as ingredients in or on processed products labeled as "organic" or "made with organic (specified ingredients or food group(s))."

Introduction:

In December 2022, Leroux petitioned the United States Department of Agriculture (USDA) National Organic Program (NOP) to add magnesium carbonate as a processing aid to the National List at § 205.605. The Handling Subcommittee requested a Technical Report (TR), which is still in process. Therefore, the information presented in this discussion document is solely from the petition.

Relevant Background:

Magnesium carbonate was previously listed at § 205.605(b) with the following annotation: "for use only in agricultural products labeled "made with organic (specified ingredients or food group(s))," prohibited in agricultural products labeled "organic"." (65 FR 80547, page 1708)

In 2005, magnesium carbonate was petitioned for inclusion to the National List as a filtering aid at § 205.606. The petition was rejected by the NOP because it was incomplete, and magnesium carbonate was ineligible to be added at § 205.606 as it is not agricultural.

During the sunset review process in 2015, the Board voted to remove magnesium carbonate from the National List stating, "the material does not appear to be essential to organic handling." Magnesium carbonate was removed from the National List effective August 7, 2017. The final rule stated, "AMS received no public comments concerning the proposed removal of...magnesium carbonate from the National List." (82 FR 31241, page 14)

Use:

Magnesium carbonate is used as a drying agent/anti-caking agent. The petitioned use is focused on organic chicory production, specifically organic instant chicory powder. The petitioner notes that during the final steps of atomization and packing, instant chicory powder sticks to the walls of the installations, requiring several stops for cleaning which reduces the rate of production.

The petition states, "The use of magnesium carbonate as a processing aid is intended for the manufacture of the instant extract of chicory obtained by atomization. The incorporation of [the petitioned substance] is done in the crown of air at the bottom of the tower feeding the dryer in order to obtain re- aeration and very good homogeneity of the product (figures 1 and 2). The maximum amount used would be 0.05%." The petition includes several diagrams to pictorially represent the use of magnesium carbonate in the production of organic instant chicory powder.

The petitioner also petitioned magnesium carbonate hydroxide. These appear to be used interchangeably.

Summary of Review:

The Handling Subcommittee is waiting to receive the TR to fully evaluate the manufacturing process and review criteria for addition to the National List. However, the Subcommittee members did discuss this substances history along with current alternatives.

It appears that silicon dioxide is currently used as an alternative. However, the petitioner states that there have been some questions raised regarding the presence of nanotechnology in silicon dioxide. The NOP prohibits the use of nanotechnology (NOP Policy Memo 15-2), therefore the Subcommittee is unsure of the merit of this argument.

Questions to our Stakeholders:

- 1. What, if anything, has changed since 2017 when magnesium carbonate was removed from the National List due to essentially?
- 2. Why are other substances listed on the National List as drying agents/anti-caking agents not effective for organic instant chicory powder?
- 3. Are there other organic products that would benefit from the use of magnesium carbonate for this use as a processing aid or should use be restricted as an anticaking agent only in instant chicory powder?
- 4. When listed previously magnesium carbonate was restricted for use in "made with organic" products only. If the NOSB recommends listing, should it consider limiting for use only in "made with organic" products?

Subcommittee Vote:

Motion to accept the discussion document on magnesium carbonate

Motion by: Kyla Smith

Seconded by: Jerry D'Amore

Yes: 8 No: 0 Abstain: 0 Recuse: 0 Absent: 1