

**LCB File No. R043-00**

**PROPOSED REGULATION OF THE DEPARTMENT OF AGRICULTURE  
NOTICE OF WORKSHOP**

A workshop will be held on proposed temporary amendments to the following administrative codes:

1. NAC 587.640 through 587.810, GARLIC GROWN FOR PRODUCTION OF SEED

**Date:** March 15, 2000

**Time:** 2:00 p.m.

**Place:** Lyon County Public Library  
Yerington

For clarification on the proposed amendments, or to obtain a copy of the amendments, please contact Randy Bradley at (775) 688-1182 extension 244.

**Addresses at which the text of the proposed regulations may be inspected and copied:**

The Nevada State Library in Carson City, and all Nevada County Libraries, the Department of Agriculture offices in Reno, Sparks, Elko, Las Vegas, or Winnemucca, during the hours of 8:00 a.m. until 5:00 p.m., Monday through Friday.

## **NOTICE OF INTENT TO ACT UPON A REGULATION**

Notice of Hearing for the Adoption of Regulations of the Nevada Department of Agriculture

The Nevada Department of Agriculture will hold a public hearing at 2:00 p.m. on March 28, 2000, at the Lyon County Public Library in Yerington. The purpose of the hearing is to receive comments from all interested persons regarding the amendment of regulations that pertain to chapter 587 of the Nevada Administrative Code. The proposed changes include several changes in the procedures for seed garlic certification and in the fee schedule for certification. The following information is provided pursuant to the requirements of NRS 233B.060:

### Need for and purpose of the proposed regulation or amendment

The changes are needed to make the standards for the certification of seed garlic current with industry needs.

### Economic effect of the proposed regulation on the businesses which it is to regulate

a. Adverse effects:

There will be an increase in the cost to individuals and companies participating in the seed garlic certification program.

b. Beneficial effects:

Many of the current provisions of the regulation have become outdated and no longer meet all of the quality assurance requirements for the garlic growing and processing industry. The additional fees for seed certification will allow the certification program to meet the increasing demand for this service and cover costs to the department for providing the program. Certification increases the value to the grower of seed produced.

c. Immediate and long term effects:

The immediate and long term effects of these proposed changes are similar.

### Economic effect of these proposed amendments on the public.

a. Adverse effects:

There are no adverse effects on the public.

b. Beneficial effects:

Local economies could benefit from the increased value of commodities produced.

c. Immediate and long term economic effects:

The immediate and long term effects should be about the same.

### Economic cost to the agency for enforcement of the proposed amendments

The proposed increase in fees should nearly equal any additional costs to the agency.

Description of any regulations of other state, local or federal governmental agencies which the proposed amendments overlap or duplicate

There are no other governmental agencies involved in the certification of seed garlic.

Fees

Existing fees will be increased to reflect current costs to the Department of Agriculture for registration, field inspection, sampling, laboratory testing and supplies necessary for the certification of seed garlic.

The proposed fee for certification is \$55 per acre. Based on 1999 registration of about 500 acres, we would expect the fees collected for the year 2000 to be approximately \$27,500.

Persons wishing to comment upon the proposed action of the Nevada Department of Agriculture may appear at the scheduled public hearing or may address their comments, data, views, or arguments in written form to the Nevada Department of Agriculture, 350 Capitol Hill Avenue, Reno, NV 89502. Written submissions must be received by the Nevada Department of Agriculture, 350 Capitol Hill Avenue, Reno, NV 89502, on or before March 28, 2000. If no person who is directly affected by the proposed action appears to request time to make an oral presentation, the Nevada Department of Agriculture, 350 Capitol Hill Avenue, Reno, NV 89502, may proceed immediately to act upon any written submissions.

A copy of this notice and the regulation to be amended will be on file at the State Library, 100 Stewart Street, Carson City, Nevada, for inspection by members of the public during business hours.

Additional copies of the notice and the regulation to be amended will be available at the Nevada Department of Agriculture, 350 Capitol Hill Avenue, Reno, NV 89502, the Nevada Department of Agriculture, 1550 South Wells Avenue, Reno, NV 89502; the Nevada Department of Agriculture, Eyer H. Boies Building, 1351 Elm Street, Elko, NV 89801; the Nevada Department of Agriculture, 2150 Frazer Street, Sparks, NV 89431; the Nevada Department of Agriculture, 1200 East Winnemucca Blvd., Winnemucca, NV 89445; the Nevada Department of Agriculture, 2300 McLeod, Las Vegas, NV 89104, and in all counties in which an office of the agency is not maintained, at the main public library, for inspection and copying by members of the public during business hours. This notice and text of the proposed regulation are also available in the Legislative Counsel Bureau pursuant to NRS 233B.0653 and on the Internet at <http://www.leg.state.nv.us>. Copies of this notice and the proposed regulation will also be mailed to members of the public upon request. A reasonable fee may be charged for copies if it is deemed necessary.

Upon adoption of any regulation, the department, if requested to do so by an interested person, either before adoption or within 30 days thereafter, will issue a concise statement of the principal reasons for or against its adoption, and incorporate therein its reason for overruling the consideration urged against its adoption.

This notice of hearing has been posted at the following locations:

Nevada Department of Agriculture  
350 Capitol Hill Avenue  
Reno, NV 89502

Nevada Department of Agriculture  
2150 Frazer Street  
Sparks, NV 89431

Nevada Department of Agriculture  
1550 South Wells Avenue  
Reno, NV 89502

Nevada Department of Agriculture  
1200 E. Winnemucca Blvd.  
Winnemucca, NV 89445

Nevada Department of Agriculture  
Eyer H. Boies Building  
1351 Elm Street  
Elko, NV 89801

Nevada Department of Agriculture  
2300 McLeod  
Las Vegas, NV 89104

**NOTE:** We are pleased to make reasonable accommodations for members of the public who are disabled and wish to attend the meeting. If special arrangements for the meeting are necessary, please call Robert Gronowski at the Nevada Department of Agriculture, 775-688-1180, as soon as possible.

Date: February 17, 2000

**PROPOSED AMENDMENTS TO NAC 587.640 TO 587.610, INCLUSIVE**  
**January 14, 2000**

~~{Test deleted}~~  
*Text Added*

~~{GARLIC GROWN FOR PRODUCTION OF SEED}~~  
***REGISTRATION AND CERTIFICATION OF SEED GARLIC***

NAC 587.640 Definitions. As used in NAC 587.640 to 587.810, inclusive, unless the context otherwise requires, the words and terms defined in NAC 587.650 to 587.710, inclusive, have the meanings ascribed to them in those sections.

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

NAC 587.650 "Certified block" defined. "Certified block" means a planting of garlic which ~~is maintained to produce~~ *has been established using registered stock for the production of certified stock.*

*NAC 587 \_\_\_\_ "Certified seed garlic" defined. "Certified seed garlic" means garlic that meets all requirements for certified stock produced in accordance with the provisions of NAC 587.640 to 587.810, inclusive.*

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

NAC 587.660 "Certified stock" defined. "Certified stock" means ~~plants or cloves of garlic which are:~~

~~1. The progeny of registered stock; or~~

~~2. The progeny of certified stock produced in a certified block~~ *garlic that has been produced in a certified block. Seed garlic lots produced from an increase block, when the entire planting meets increase block requirements for a minimum of three years from entry into the program, are also eligible to be designated as certified stock.*

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

*NAC 587. \_\_\_\_ "Department" defined. "Department" means the Nevada State Department of Agriculture.*

NAC 587.680 "Foundation block" defined. "Foundation block" means a planting of garlic which is *planted with seed stock from a source approved by the department and* maintained to produce foundation stock.

(Added to NAC by Dep't of Agriculture, eff. 10-26-83)

NAC 587.690 "Foundation stock" defined. "Foundation stock" means *garlic produced in a foundation block* ~~[the progeny of nuclear stock]~~.

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A 1-27-89; A by Div. of Agriculture, 2-20-96)

NAC 587.700 "Garlic" defined. "Garlic" means the plants, *plantlets, bulbs, cloves or any part of Allium sativum and its cultivars*.

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

NAC 587.705 ~~["Nuclear stock" defined. "Nuclear stock" means any seed stock or propagative material approved by the administrator for use as stock to produce certified seed]~~ *"Nursery increase block" defined. "Nursery increase block" means a garlic planting which has been established using foundation or registered stock for the production of registered stock.*

(Added to NAC by Div. of Agriculture, eff. 2-20-96)

*NAC 587.\_\_\_\_ "Participant" defined. "Participant" means any person or legal entity whose application has been submitted to and accepted by the department.*

*NAC 587.\_\_\_\_ "Program" defined. "Program" means the seed garlic registration and certification program administered by the department pursuant to NAC 587.640 to 587.810, inclusive.*

NAC 587.710 "Registered stock" defined. "Registered stock" means ~~[the progeny of foundation stock]~~ *garlic produced in a nursery increase block.*

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

NAC 587.720 Applicability. NAC 587.640 to 587.810, inclusive, govern the standards for the *registration of planting stock and the* certification of garlic ~~[seed]~~.

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

~~[NAC 587.723 Classes recognized in certification of seed. The following classes of seed are recognized in the certification of garlic seed:~~

~~1. Foundation;~~

~~2. Registered; and~~

~~3. Certified.~~

~~(Added to NAC by Div. of Agriculture, eff. 2-20-96)]~~

*NAC 587.\_\_\_\_ General provisions. Participation in this program is voluntary and may be withdrawn at the option of the participant. Approval, supervision, inspection, sampling*

*determination, registration and certification shall be conducted by the department or its authorized agents.*

*1. Planting locations accepted by the department, laboratory examinations, and visual inspections form the basis for approval of registration as a propagative source and certification as Nevada certified seed garlic.*

*(a) Approval of registration. The department may approve the registration as a source of propagative material, either foundation or registered stock, which has been tested and found free of stem and bulb nematode, (*Ditylenchus dipsaci*), and has been inspected and found free of white rot fungus, (*Sclerotium cepivorum*).*

*(b) Certification. The department may certify garlic as Nevada certified seed garlic stock which has been inspected and found free of white rot fungus, (*Sclerotium cepivorum*) and has met all other requirements for qualification as certified stock.*

*2. Official tags issued by the department or other means of labeling may be authorized for use to identify garlic that meets the requirements of NAC 587.640 to 587.810, inclusive.*

*3. Except as otherwise provided, certification is based solely on a sample of garlic from each planting entered in the program.*

NAC 587.725 Application ~~[for certification of seed]~~.

1. ~~[To obtain certification of garlic seed,]~~ ~~[a]~~ A ~~[grower]~~ *participant* must submit to the ~~[division]~~ *department* an application ~~[for certification]~~ for each separate planting of stock on a form obtained from the ~~[division]~~ *department*.

2. Each application must include all information requested for the ~~[class of seed to be produced in]~~ *planting stock and the planting site, including documentation verifying the eligibility for the class of seed to be produced,* and must be accompanied by the fee established in NAC 587.810.

3. Applications must be received by the ~~[division]~~ *department* by ~~[December]~~ *August 1* ~~[for within 2 weeks after planting for fields planted after December 1]~~ *of each year prior to planting for approval of the planting site. A final application for all plantings must be submitted, along with the required fees, by February 15.*

4. The ~~[administrator]~~ *department* may accept applications after the deadline if the planting site complies with the requirements of NAC 587.640 to 587.810, inclusive, and the ~~[division]~~ *department* is able to inspect the additional acreage and analyze the plants in the laboratory.

(Added to NAC by Div. of Agriculture, eff. 2-20-96)

NAC 587.727 Field inspection; *testing procedures.* ~~[prerequisite to certification of seed. Before accepting a planting of nuclear stock for certification of the seed, the administrator or a person~~

~~designated by the administrator will inspect each field used for the planting for]~~ *Inspections and testing procedures approved by the department to detect stem and bulb nematode and white rot fungus shall be conducted by the department at times determined as suitable. Additional inspections or tests may be required by the department if seasonal conditions or other factors tend to obscure disease symptoms or make adequate inspections difficult, or when stem and bulb nematode or white rot fungus or other serious pests are suspected. The department may sample garlic from any planting or storage facility for inspection or testing purposes. Samples shall be furnished without charge. To determine the eligibility of a planting, inspection and testing shall include:*

1. ~~[White rot (Schlerotium cepivorum),] [a] At least one [once during each] growing-season [, by making a visual] field inspection [during the stage of growth when white rot can most easily be detected and analyzing the plants suspected of carrying white rot after the visual inspection in the laboratory].~~
2. ~~[Stem and bulb nematode of the Allium species (Ditylenchus dipsaci), at least once during each growing season, by collecting samples of plants of all classes of seed, including seed that is the progeny of the certified stock, in the pattern of a grid at approximately 20 foot intervals throughout the field and analyzing each sample in the laboratory. The administrator or the person designated by the administrator will number and index each sample according to the row in the field from which it was taken] Laboratory examination of a sample of garlic for stem and bulb nematode, except as otherwise provided.~~

*(a) For foundation and increase block plantings a sample of garlic shall be collected at approximately 20 foot intervals.*

*(b) For certified block plantings sampling and testing is at the option and request of the participant. If sampling is requested, samples will be collected at approximately 40 foot intervals.*

(Added to NAC by Div. of Agriculture, eff. 2-20-96)

NAC 587.730 ~~[Approval]~~ *Eligibility* of *planting* stock ~~[; certification of seed].~~

1. ~~[The administrator or a person designated by the administrator must approve nuclear stock before the seed grown from the stock may be certified.] The [administrator or a person designated by the administrator] department may approve [selected] stock or propagative material [as nuclear stock] for registration or certification based on [his] inspection and testing or other means to determine that the stock has not been found to be infested with white rot fungus or stem and bulb nematode. This includes stock produced in another program recognized the by department as having met standards at least as strict as those contained in NAC 587640 to 587.810, inclusive. Garlic which has been exposed to a white rot fungus or stem and bulb nematode infestation shall not be eligible for registration or certification. [may approve stock that has been certified by the proper official of another state if the grower demonstrates that the stock is genuine. The grower may demonstrate that the stock is genuine by submitting:]~~



- (a) ~~[Certification tags that are attached to individual bags or containers;]~~ *Foundation Block. To be eligible for planting, garlic plants shall be produced via laboratory disease elimination techniques or shall be garlic plants from a planting approved by the department.*
- (b) ~~[Invoices that identify the seed lot; or]~~ *Nursery increase block. To be eligible for planting, garlic plants shall be foundation stock or registered stock.*
- (c) ~~[Other certification documents that are satisfactory to the administrator or a person designated by the administrator.]~~ *Certified block. To be eligible for planting, garlic plants shall be registered stock.*

If approved, the nuclear stock must be planted in a foundation block for the production of foundation seed.

2. ~~[The administrator may approve propagative material as registered or certified stock if the grower demonstrates that the original stock was free from white rot and stem and bulb nematode and that the methods used to produce the propagative material would not allow contamination by these organisms during the growing period]~~ *The participant must provide to the department evidence that the stock is eligible for the class of seed to be produced such as; tags issued by a recognized certification agency, invoices, or other documentation pertaining to the stock.*

~~[3. At any stage in the growing process, the administrator or a person designated by the administrator may certify that seed is foundation, registered or certified seed and that the seed is free of any white rot or stem and bulb nematodes.~~

~~4. The administrator may accept stock certified by another state as certified seed if the requirements for certification in that state are met and the administrator determines that those requirements are similar to the requirements of this state.]~~

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A 1-27-89; A by Div. of Agriculture, 2-20-96)

NAC 587.740 Grounds for refusal or cancellation of *registration or* certification of planted or harvested garlic. The ~~[administrator]~~ *department* will refuse to *register or* certify or will cancel the *registration or* certification of a planting, or any portion of a planting, of garlic or harvested ~~[bulbs or cloves of]~~ garlic if:

1. The planting, bulbs or cloves are found to be infested *or infested* with stem and bulb nematode of *Allium* species (*Ditylenchus dipsaci*) or white rot (*Sclerotium cepivorum*), or any other pest of garlic, unless the ~~[administrator]~~ *department* determines the infestation *or infection* to be one of minor economic importance which can be rogued, delimited or treated;

2. Excessive growth of weeds, damage from pests or any other condition prevents adequate inspection of the ~~[field]~~ *planting; [or]*

3. The ~~[grower]~~ *participant* has failed to comply with any provisions of NAC 587.640 to 587.810, inclusive;

*4. The participant has failed to pay in a timely manner, any fee required by the provisions of NAC 587.64 to 587.810, inclusive;*

*5. For any reason the identity of the garlic becomes uncertain or has not been maintained;*

*6. The certification seal or tags are misused or stock is materially misrepresented, whether or not the participant knew or should have known of the misrepresentation.*

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A 1-27-89; A by Div. of Agriculture, 2-20-96)

NAC 587.750 ~~[Spacing of fields for production of certified seed. Fields for the production of any class of certified garlic seed must be located:]~~ *Requirements for plantings. Each planting location shall be subject to inspection by the department and shall be in a geographic area where contamination by stem and bulb nematode and white rot fungus from drainage, flooding, irrigation or other means is not likely to occur. The location requirements may be waived if the planting is made in a facility approved by the department or if the land or soil has been treated in a manner approved by the department to eliminate soil-borne pests.*

*1. Each planting shall be on land which no Allium species has grown for five years prior to planting.*

*2. Each planting shall be on land which is not known to be infested with white rot fungus.*

~~[1.]~~ *3. Each planting shall be isolated by [A] at least 500 feet from any ~~[planting of stock which has not been approved for production of certified seed and from any planting of onions or any other]~~ Allium species not entered in the program. This requirement may be waived if, in the judgment of the department, there exists a sufficient natural barrier or if garlic not entered in the program has an equivalent known history.*

~~[2. At least 12 feet from any other planting of stock which has been approved for production of certified seed.]~~

*4. Each foundation block, nursery increase block, and certified block shall be a separate planting of garlic. There shall be a minimum of six feet or one blank bed separating blocks or varieties within a block unless suitable precautions are taken to maintain identity.*

~~[These distances may be reduced if a barrier exists that would prevent the contamination of a field for the production of certified garlic seed by water or soil from another field.]~~

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

~~[NAC 587.760 Approval of field for production of certified seed. A grower must obtain approval of a field on which he intends to produce certified garlic seed from the administrator before he begins to plant on the field. The administrator will not approve a field for production of any class of certified garlic seed if:~~

- ~~1. White rot has ever been detected in plants grown in the field; or~~
- ~~2. Garlic, onions or any other host plant of stem and bulb nematode of the Allium species has been grown in any of the immediately preceding 3 years before planting for certification.~~

~~(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)~~

NAC 587.780 Duties of ~~[grower]~~ *participant*. A ~~[grower of garlic]~~ *participant* shall:

1. Keep pests and weeds under control;
2. Use suitable precautions when cultivating, irrigating or moving or using equipment to prevent the spread of soil-borne pests;
3. Ensure that all bins or other containers *and equipment* to be used for the movement or storage of ~~[certified]~~ garlic ~~[seed]~~ are free of any dirt and residues from garlic, onions or other Allium species;
4. Maintain the identity of ~~[the]~~ *all* garlic *entered in the program* ~~[by ensuring that all plants in a field are of the same variety and class]; [and]~~
5. Keep records on each field that document the amount of seed produced, the certification number, *and* the tags used to identify the containers of seed ~~[and the locations where the seed is or will be distributed]~~. *The tag use and production records shall be kept on an inventory sheet supplied by the department, unless otherwise specified by the department in writing, and shall be submitted annually after the close of the season for sale or distribution of seed stocks;*
- 6. Ensure the proper use of certification seals and tags provided by the department and mark on each tag the participant's name, harvest date (month and year), variety and the block number assigned by the department; and*
- 7. Notify the department of the date of all pest control treatments in plantings for which inspections or other departmental activities are scheduled providing the product(s) used, dosage(s) and any re-entry or worker safety requirements which apply.*

~~(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)~~

NAC 587.790 Handling, harvesting, transporting and storage of ~~[certified]~~ seed *garlic*.

1. ~~[Certified]~~ ~~[g]~~Garlic ~~[seed]~~ *from a planting* must be handled in a manner that prevents mixing with or contamination by other lots of garlic ~~[that are not certified]~~ during harvesting, *transporting*, cracking and storage.

2. Equipment used for harvesting and containers used for transporting, *processing* and storing garlic ~~[seed]~~ must be free from soil or other contaminating material before use.
3. Containers used for transporting and storing garlic ~~[seed]~~ must identify the field in which the seed originated.

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)

NAC 587.800 ~~[Certificate for interstate transfer of certified seed or seed eligible for certification. A grower must obtain a certificate for the interstate transfer of garlic seed from the division before transporting to another state garlic seed that is eligible for certification or that is certified, if:~~

~~1. The seed is being transported for processing or treatment and will be returned to this state for planting; or~~

~~2. The state of destination, or an area within the state of destination, requires certification information pertaining to the seed.]~~ *Movement of seed stock out of state. Garlic transported out of state for storage or processing must be reported to the department at least one week in advance to maintain eligibility for future registration or certification. The report must include the field number assigned by the department, the date and amount moved and the destination.*

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A 1-27-89; A by Div. of Agriculture, 2-20-96)

NAC 587.810 Fees. The ~~[division]~~ *department* will charge and collect ~~[\$34 per acre or part of an acre of a field of garlic for the inspection of the crop and the certification of the seed produced on the acre.]~~ *the following fees for the registration or certification of garlic:*

1. *Foundation block - \$55 per acre or portion of an acre;*
2. *Nursery increase block - \$55 per acre or portion of an acre;*
3. *Certified block;*
  - (a) *\$12 per acre or portion of an acre;*
  - (b) *Optional field test for stem & bulb nematode - \$17 per acre or portion of an acre in addition to (a) above.*
4. *Fees are due with final applications by February 15 and checks should be made payable to the Nevada State Department of Agriculture.*
5. *Fees paid for services that are not rendered will be refunded to the applicant, less direct costs incurred by the department.*

(Added to NAC by Dep't of Agriculture, eff. 10-26-83; A by Div. of Agriculture, 2-20-96)