

- (b) Split or cracked shells when the shell is spread apart or will spread upon application of slight pressure;
- (c) Broken shells when any portion of the shell is missing;
- (d) Kernels which are not well cured;
- (e) Poorly developed kernels;
- (f) Kernels which are dark amber in color;
- (g) Kernel spots when more than one dark spot is present on either half of the kernel, or when any such spot is more than one-eighth inch (3 mm) in greatest dimension;
- (h) Adhering material from the inside of the shell when firmly attached to more than one-third of the outer surface of the kernel and contrasting in color with the skin of the kernel; and,
- (i) Internal flesh discoloration of a medium shade of gray or brown extending more than one-fourth inch (6 mm) lengthwise beneath the center ridge, or any equally objectionable amount in other portions of the kernel; or lesser areas of dark discoloration affecting the appearance to an equal or greater extent.

§51.1414 Serious damage.

Serious damage means any specific defect described in this section; or an equally objectionable variation of any one of these defects, or any other defect, or any combination of defects, which seriously detracts from the appearance or the edible or marketing quality of the individual pecan. The following defects shall be considered as serious damage:

- (a) Adhering hull material or dark stains affecting an aggregate of more than 20 percent of the individual shell;
- (b) Broken shells when the missing portion of shell is greater in area than a circle one-fourth inch (6 mm) in diameter;
- (c) Worm holes when penetrating the shell;
- (d) Rancidity when the kernel is distinctly rancid to the taste. Staleness of flavor shall not be classed as rancidity;
- (e) Mold, on the surface or inside the kernel, which is plainly visible without magnification;
- (f) Decay affecting any portion of the kernel;
- (g) Insect injury when the insect, web or frass is present inside the shell, or

the kernel shows distinct evidence of insect feeding;

- (h) Kernel spots when more than three dark spots on either half of the kernel, or when any spot or the aggregate of two or more spots on one of the halves of the kernel affects more than 10 percent of the surface;
- (i) Dark discoloration of the skin which is darker than dark amber over more than 25 percent of the outer surface of the kernel;
- (j) Internal flesh discoloration of a dark shade extending more than one-third the length of the kernel beneath the ridge, or an equally objectionable amount of dark discoloration in other portions of the kernel; and,
- (k) Undeveloped kernels having practically no food value, or which are blank (complete shell containing no kernel).

§51.1415 Inedible kernels.

Inedible kernels means that the kernel or pieces of kernels are rancid, moldy, decayed, injured by insects or otherwise unsuitable for human consumption.

OPTIONAL DETERMINATIONS

§51.1416 Optional determinations.

The determinations set forth herein are not requirements of these standards. They may be performed upon request in connection with the grade determination or as a separate determination. Samples of pecans for these determinations shall be taken at random from a composite sample drawn throughout the lot.

(a) *Edible kernel content.* A minimum sample of at least 500 grams of in-shell pecans shall be used for determination of edible kernel content. After the sample is weighed and shelled, edible appearing half kernels and pieces of kernels shall be separated from shells, center wall, and other non-kernel material, and inedible kernels (see §51.1415) and pieces of kernels, and weighed to determine edible kernel content for the lot.

(b) *Poorly developed kernel content.* A minimum sample of at least 500 grams of in-shell pecans shall be used for determination of poorly developed kernel

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content. The amount of poorly developed kernels and pieces of kernels shall be weighed to determine poorly developed kernel content of the lot (see § 51.1411 and Figure 1).

(c) *Edible kernel content color classification.* The amount of "Light," "Light amber," "Amber," "Dark amber" and darker shades of skin color shall be determined according to § 51.1403, Kernel Color Classification. The total weight of edible kernels and pieces of kernels shall be the basis for determining color classification content for the lot.

(d) *Kernel moisture content.* The sample of pecans for determination of kernel moisture content shall be shelled immediately before analysis and all shells, center wall and other non-kernel material removed. The air-oven or other methods or devices which give equivalent results shall be used for moisture content determination.

Subpart—United States Standards for Grades of Shelled Pecans

SOURCE: 34 FR 9377, June 14, 1969, unless otherwise noted. Redesignated at 42 FR 32514, June 27, 1977, and further redesignated at 46 FR 63203, Dec. 31, 1981.

GRADES

§ 51.1430 U.S. No. 1 Halves.

"U.S. No. 1 Halves" consists of pecan half-kernels which meet the following requirements:

- (a) For quality:
 - (1) Well dried;
 - (2) Fairly well developed;
 - (3) Fairly uniform in color;
 - (4) Not darker than "amber" skin color;
 - (5) Free from damage or serious damage by any cause;
 - (6) Free from pieces of shell, center wall and foreign material; and,
 - (7) Comply with tolerances for defects (see § 51.1439); and,
- (b) For size:
 - (1) Halves are fairly uniform in size;
 - (2) Halves conform to size classification or count specified; and,
 - (3) Comply with tolerances for pieces, particles, and dust (see § 51.1437).

§ 51.1431 U.S. No. 1 Halves and Pieces.

The requirements for this grade are the same as those for U.S. No. 1 Halves except:

- (a) For size:
 - (1) At least 50 percent, by weight, are half-kernels;
 - (2) Both halves and pieces will not pass through a 5/16-inch round opening; and,
 - (3) Comply with tolerances for undersize. (See Table III.)

§ 51.1432 U.S. No. 1 Pieces.

The requirements for this grade are the same as those for U.S. No. 1 Halves except:

- (a) For quality:
 - (1) No requirement for uniformity of color; and,
- (b) For size:
 - (1) No requirement for percentage of half-kernels;
 - (2) Conform to any size classification or other size description specified; and,
 - (3) Comply with applicable tolerances for off-size. (See Table III.)

§ 51.1433 U.S. Commercial Halves.

The requirements for this grade are the same as those for U.S. No. 1 Halves except:

- (a) For quality:
 - (1) No requirement for uniformity of color; and,
 - (2) Increased tolerances for defects (see § 51.1439); and,
- (b) For size:
 - (1) No requirement for uniformity of size.

§ 51.1434 U.S. Commercial Halves and Pieces.

The requirements for this grade are the same as those for U.S. No. 1 Halves and Pieces except:

- (a) For quality:
 - (1) No requirement for uniformity of color; and,
 - (2) Increased tolerances for defects. (See § 51.1439.)

§ 51.1435 U.S. Commercial Pieces.

The requirements for this grade are the same as those for U.S. No. 1 Pieces except for:

- (a) Increased tolerances for defects. (See § 51.1439.)