

§ 172.215

21 CFR Ch. I (4-1-01 Edition)

- (1) Substances generally recognized as safe for the purpose or previously sanctioned for the purpose. (2) One or more of the following:

| Component | Limitations |
|---|--|
| Fatty acids | Complying with § 172.860. |
| Oleic acid derived from tall oil fatty acids | Complying with § 172.862. |
| Partially hydrogenated rosin | Catalytically hydrogenated to a maximum refractive index of 1.5012 at 100 °C. Color of WG or paler. |
| Pentaerythritol ester of maleic anhydride-modified wood rosin. Do | Acid number of 134-145; drop-softening point of 127 °C-173 °C; saponification number of less than 280; and a color of M or paler. |
| Polyethylene glycol | Acid number of 176-186; drop-softening point of 110 °C-118 °C; saponification number of less than 280; and a color of M or paler. |
| Polyhydric alcohol diesters of oxidatively refined (Gersthofen process) montan wax acids. | Complying with § 172.820. As a defoamer and dispersing adjuvant. |
| Sodium lauryl sulfate | Complying with § 178.3770 of this chapter and having a dropping point of 77 to 83 °C (170.6 to 181.4 °F), as determined by ASTM Method D566-76 (Reapproved 1982), "Standard Test Method for Dropping Point of Lubricating Grease," which is incorporated by reference (copies are available from the American Society for Testing and Materials, 1916 Race St., Philadelphia, PA 19103, or available for inspection at the Office of the Federal Register, 800 North Capitol Street, NW., suite 700, Washington, DC 20408) using as a solvent xylene-ethyl alcohol in a 2:1 ratio instead of toluene-ethyl alcohol in a 2:1 ratio. |
| Wood rosin | Complying with § 172.822. As a film former. Color of K or paler. |

- (3) In lieu of the components listed in paragraph (b) (2) and (4) of this section, the following copolymer and one or more of the listed adjuvants.

| Component | Limitations |
|--|---|
| Vinyl chloride-vinylidene chloride copolymer | As an aqueous dispersion containing a minimum of 75 percent water when applied. |
| Polyethylene glycol | Complying with § 172.820. As a defoamer and dispersing adjuvant. |
| Polyvinylpyrrolidone | As an adjuvant. |
| Potassium persulfate | Do. |
| Propylene glycol alginate | Do. |
| Sodium decylbenzenesulfonate | Do. |

- (4) In lieu of the components listed in paragraph (b) (2) and (3) of this section, the following rosin derivative and either or both of the listed adjuvants:

| Component | Limitations |
|---|--|
| Calcium salt of partially dimerized rosin | Having a maximum drop-softening point of 197 °C and a color of H or paler. It is prepared by reaction with not more than 7 parts hydrated lime per 100 parts of partially dimerized rosin. The partially dimerized rosin is rosin that has been dimerized by sulfuric acid catalyst to a drop-softening point of 95 °C to 105 °C and a color of WG or paler. |
| Petroleum naphtha | As adjuvant. Complying with § 172.250. |
| Sperm oil | As adjuvant. |

[42 FR 14491, Mar. 15, 1977; 49 FR 5747, Feb. 15, 1984, as amended at 51 FR 2693, Jan. 21, 1986; 52 FR 18911, May 20, 1987; 61 FR 14245, Apr. 1, 1996]

§ 172.215 Coumarone-indene resin.

The food additive coumarone-indene resin may be safely used on grapefruit, lemons, limes, oranges, tangelos, and tangerines in accordance with the following prescribed conditions:

(a) The food additive is manufactured by the polymerization of a crude,

heavy coal-tar solvent naphtha meeting the following specifications:

(1) It is a mixture of indene, indan (hydrindene), substituted benzenes, and related compounds.

(2) It contains no more than 0.25 percent tar bases.

(3) 95 percent distills in the range 167 °C-184 °C.

(b) The food additive meets the following specifications:

(1) Softening point, ring and ball: 126 °C minimum as determined by ASTM method E28-67 (Reapproved 1982), "Standard Test Method for Softening Point by Ring-and-Ball Apparatus," which is incorporated by reference. Copies may be obtained from the American Society for Testing Materials, 1916 Race St., Philadelphia, PA 19103, or may be examined at the Office of the Federal Register, 800 North Capitol Street, NW., suite 700, Washington, DC 20408.

(2) Refractive index ($n^{25/D}$) 1.63-1.64.

(c) It is used or intended for use as a protective coating for grapefruit, lemons, limes, oranges, tangelos, and tangerines whereby the maximum amount of the resin remaining on the fruit does not exceed 200 parts per million on a fresh-weight basis.

(d) To assure safe use of the additive:

(1) The label of the market package or any intermediate premix of the additive shall bear, in addition to the other information required by the act:

(i) The name of the additive, coumarone-indene resin.

(ii) A statement of the concentration of the additive therein.

(2) The label or accompanying labeling shall bear adequate directions that, if followed, will result in a finished food not in conflict with the requirements of this section.

[42 FR 14491, Mar. 15, 1977, as amended at 49 FR 10103, Mar. 19, 1984]

§ 172.225 Methyl and ethyl esters of fatty acids produced from edible fats and oils.

Methyl esters and ethyl esters of fatty acids produced from edible fats and oils may be safely used in food, subject to the following prescribed conditions:

(a) The additive consists of a mixture of either methyl or ethyl esters of fatty acids produced from edible fats and oils and meets the following specifications:

(1) Not less than 90 percent methyl or ethyl esters of fatty acids.

(2) Not more than 1.5 percent unsaponifiable matter.

(b) The additive is used or intended for use at the level not to exceed 3 per-

cent by weight in an aqueous emulsion in dehydrating grapes to produce raisins, whereby the residue of the additive on the raisins does not exceed 200 parts per million.

[57 FR 12711, Apr. 13, 1992]

§ 172.230 Microcapsules for flavoring substances.

Microcapsules may be safely used for encapsulating discrete particles of flavoring substances that are generally recognized as safe for their intended use or are regulated under this part, in accordance with the following conditions:

(a) The microcapsules may be formulated from the following components, each used in the minimum quantity required to accomplish the intended effect:

(1) Substances generally recognized as safe for the purpose.

(2) One or more of the following components:

COMPONENT AND LIMITATIONS

Succinylated gelatin—Not to exceed 15 percent by combined weight of the microcapsule and flavoring oil. Succinic acid content of the gelatin is 4.5 to 5.5 percent.

Arabinogalactan—Complying with §172.610; as adjuvant.

Silicon dioxide—Complying with §172.480; as adjuvant.

(3) In lieu of the components listed in paragraph (a)(2) of this section, the following components:

COMPONENT AND LIMITATIONS

Glutaraldehyde—As cross-linking agent for insolubilizing a coacervate of gum arabic and gelatin.

n-Octyl alcohol—As a defoamer.

(4) In lieu of the components listed in paragraphs (a)(2) and (3) of this section, the following component:

COMPONENT AND LIMITATIONS

Petroleum wax—Complying with §172.886. Not to exceed 50 percent by combined weight of the microcapsule and spice-flavoring substance.

(b) The microcapsules produced from the components listed in paragraphs (a) (1), (2), and (3) of this section may be used for encapsulating authorized flavoring oils for use, in accordance with