

$B$ =Absorptivity of amphotericin B standard at 282 nanometers;

$a$ =Absorptivity of nystatin standard at 304 nanometers;

$b$ =Absorptivity of amphotericin B standard at 304 nanometers;

$S_1$ =Absorbance of sample at 282 nanometers;

$S_2$ =Absorbance of sample at 304 nanometers;

$W_s$ =Weight of sample in grams (on an anhydrous basis).

(3) [Reserved]

(4) *Loss on drying.* Proceed as directed in § 436.200(b) of this chapter.

(5) *Residue on ignition.* Proceed as directed in § 436.207(a) of this chapter.

(6) *Identity.* Using the solutions prepared as described in paragraphs (b)(2)(ii), (iii), and (iv) of this section, record the absorption spectrum from 320 to 240 nanometers. Then dilute these solutions (1+9) with methyl alcohol and record the absorption spectrum from 400 to 320 nanometers. The sample exhibits absorption peaks at identical wavelengths with that of the amphotericin B standard. Depending on the amphotericin A content of the sample, a peak may occur at 304 nanometers.

[39 FR 19115, May 30, 1974, as amended at 46 FR 16684, Mar. 13, 1981; 49 FR 2242, Jan. 19, 1984; 50 FR 19920, May 13, 1985]

#### § 449.4a Amphotericin B for use in parenteral products.

(a) *Requirements for certification—(1) Standards of identity, strength, quality, and purity.* Amphotericin B is a yellow to golden-orange powder. It is insoluble in water at pH 6.0 to 7.0, anhydrous alcohols, esters, ethers, benzene, and toluene. It is soluble in dimethylformamide and dimethylsulfoxide. It is so purified and dried that:

(i) Its potency is not less than 750 micrograms of amphotericin B per milligram on an anhydrous basis.

(ii) It contains not more than 5 percent of amphotericin A.

(iii) [Reserved]

(iv) Its loss on drying is not more than 5.0 percent.

(v) It contains not more than 0.5 percent residue on ignition.

(vi) It passes the identity test.

(2) *Labeling.* In addition to the labeling prescribed by § 432.5(b) of this chap-

ter, each package shall bear on its label the statements "Store below 10° C." and "Protect from light and moisture".

(3) *Requests for certification; samples.* In addition to the requirements of § 431.1 of this chapter, each such request shall contain:

(i) Results of tests and assays on the batch for potency, amphotericin A content, loss on drying, residue on ignition, and identity.

(ii) Samples required on the batch: 10 packages, each containing not less than 500 milligrams.

(b) *Tests and methods of assay—(1) Potency.* Proceed as directed in § 436.105 of this chapter, preparing the sample for assay as follows: Dissolve an accurately weighed sample in sufficient dimethylsulfoxide to give a stock solution of convenient concentration. Further dilute with dimethylsulfoxide to give a concentration of 20 micrograms of amphotericin B per milliliter (estimated). Dilute an aliquot with 0.2M potassium phosphate buffer, pH 10.5 (solution 10), to the reference concentration of 1.0 microgram of amphotericin B per milliliter (estimated).

(2) *Amphotericin A content.* Proceed as directed in § 449.4(b)(2).

(3) [Reserved]

(4) *Loss on drying.* Proceed as directed in § 436.200(b) of this chapter.

(5) *Residue of ignition.* Proceed as directed in § 436.207(a) of this chapter.

(6) *Identity.* Proceed as directed in § 449.4(b)(7).

[39 FR 19134, May 30, 1974, as amended at 49 FR 2243, Jan. 19, 1984; 50 FR 19920, May 13, 1985]

#### § 449.10 Candicidin.

(a) *Requirements for certification—(1) Standards of identity, strength, quality, and purity.* Candicidin is a brown to yellow powder. It is sparingly soluble in water; very slightly soluble in ethyl alcohol, butyl alcohol, and acetone. It is so purified and dried that:

(i) Its potency is not less than 1,000 micrograms of candicidin per milligram on an anhydrous basis.

(ii) Its loss on drying is not more than 4 percent.

(iii) Its pH is not less than 8.0 nor more than 10.0 in a 1 percent aqueous suspension.