WAC 16-302-280 Eligibility for corn seed certification. Eligibility for corn seed certification is as follows:

(1) Foundation corn inbred lines:

(a) For the purposes of corn seed certification, the propagation of male sterile inbred lines is subject to the same requirements and rules as apply to foundation single crosses in subsection (2) of this section.

(b) An inbred line must be a relatively true breeding strain of corn resulting from at least five successive generations of controlled self-fertilization; or at least five generations of back-crossing to a recurrent parent with selection; or its equivalent.

(c) Inbred lines increased by hand pollination are eligible for corn seed certification.

(d) An inbred used as a pollinator in a foundation single cross production corn field may be certified if all the seed parents in the isolated corn field are inspected for certification and meet all field requirements for certification.

(e) Addition of specific genetic factors to a line of corn.

(i) When a specific genetic factor(s) is added to an inbred line, the line must be backcrossed to its recurrent parent at least five generations. The line shall be homozygous for the specific genetic factor(s) except for the pollen restoration factor(s), and the genic male sterile maintainer line.

(ii) For a recovered pollen restorer inbred line, selection must be relative to a specific cytoplasmic male sterile source.

(iii) The originator must supply proof of the genetic nature of a recovered line.

(iv) A genic male sterile maintainer line, consisting of duplicate-deficient and male-steriles in an approximate one to one ratio must be no more than two generations removed from breeder's seed. The maintainer must be designated according to generation as:

(A) Breeder seed: The hand pollinated selfed seed from a known duplicate-deficient plant heterozygous at a particular male sterile locus.

(B) Foundation I seed: The product of random-mating among fertile plants arising from breeder seed.

(C) Foundation II seed: The product of random-mating among fertile plants arising from foundation I seed.

(v) A genic male sterile line must be a strain homozygous for a particular male sterile recessive allele.

(vi) The genic male sterile lines shall be identified as to the recessive genes they carry, e.g., B37 ms-1, N26 ms-10. The maintainer lines must be identified not only for the male sterile gene for which it is heterozygous, but also for the specific translocation from which it was derived, e.g., B37 Mt-1 ms-1, N28 Mt-1 ms-10.

(2) Foundation corn single crosses:

(a) Foundation single cross. A foundation single cross must consist of the first generation of a cross between: Two inbred lines; an inbred line and a foundation back cross; or two foundation back crosses.

(b) Foundation back-crosses:

(i) A first generation foundation back cross must be the first generation cross between a foundation single cross of related inbred lines and an inbred line which must be the same as one of the inbreds in the foundation single cross.

(ii) A second generation foundation back cross must be made by using a first generation back cross as the seed parent and the polli-

nating parent shall be an inbred line. The inbred line must be the same as the inbred parent used in making the first generation back cross seed parent.

(c) A male sterile line may be substituted for its fertile counterpart as one parent of a foundation single cross if the male sterile line has been backcrossed for not less than five generations to its fertile counterpart, or the male sterile line is the same in other characteristics as its fertile counterpart.

(d) Male sterile lines propagated by hand pollination will be are eligible for certification.

(e) A pollen restoring line may be substituted for its nonrestoring counterpart in a foundation single cross if the pollen restoring line is the same in other characteristics as its nonrestoring counterpart.

(3) Hybrid corn seed:

(a) Hybrid corn seed is seed to be planted for the production of feed or for use other than seed. It may be any one of the following:

(i) Double cross - The first generation cross between two foundation single crosses.

(ii) Three-way cross - The first generation cross between a foundation single cross as one parent and an inbred line or a foundation back cross as the other parent.

(iii) Single cross must consist of the first generation of a cross between: Two inbred lines; an inbred line and a foundation back cross; or of two foundation back crosses.

(b) Foundation single cross seed and foundation back cross seed planted for the production of double cross, single cross, or three-way cross hybrid corn seed must be completely certified by a recognized seed certifying agency.

(c) Inbred line seed planted for the production of single cross or three-way cross hybrid corn seed to be used for grain or forage production must meet the requirements for the definition of an inbred line (as provided for in subsection (1)(b) of this section) and be certified.

(d) Only the class "certified" is recognized.

(4) Inbred seed and the seed of each parent for single crosses must meet one of the following requirements:

(a) Be in the hands of the originator;

(b) Be a line obtained directly from the originator;

(c) Be a line obtained from a state agricultural experiment station;

(d) Be a line obtained from the United States Department of Agriculture; or

(e) Be certified. Evidence of eligibility must be a certification tag taken from the seed planted.

[Statutory Authority: RCW 15.49.005, 15.49.081, 15.49.310, 15.49.370(3) and chapter 17.24 RCW. WSR 00-24-077, § 16-302-280, filed 12/4/00, effective 1/4/01.]