

2. Stability of self-red mutations from variegated pericarp.

Variegated pericarp frequently mutates sufficiently early in the development of the ear to give rise to kernels, and patches consisting a number of kernels, which are self-colored (red). A number of such mutations have been studied, with the object of determining possible differences in stability.

In order to insure about the same genetic background for the P^{RR} allele (red pericarp and cob), comparisons were made between families derived from independent mutant spots on the same variegated ear. The stability of the mutants was measured by counting the number of back mutations to light orange, variegated, and colorless pericarp.

The results show that independent self-red mutations on the same ear, from variegated to red pericarp, give rise to self-reds which may differ significantly in back mutation rate.

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