

2. Activator of bz^m_2 mutability.

The bz^m_2 allele is dependent for its mutability upon another factor, tentatively designated M. Whenever bz^m and M are in the same cells, bz^m mutates at a very high frequency back to types resembling normal Bz_2 . In the absence of M, bz^m is quite stable. The behavior of M resembles that of McClintock's Ac agent in several respects, the most important of which are (a) frequent changes of state, and (b) similar dosage relationships. That is, M, when in one dose, causes bz^m to mutate early producing frequent large sectors, but when present in 2 or 3 doses, causes bz^m to mutate later, producing many small sectors. These two characteristics of M are in contrast to the behavior of the other important group of mutators, the Dt loci, which are relatively stable and which show an increase in mutation frequency of the affected locus (a) at all stages if the dose of the mutator is increased.