

Effect of PEV modifiers on *white* variegation

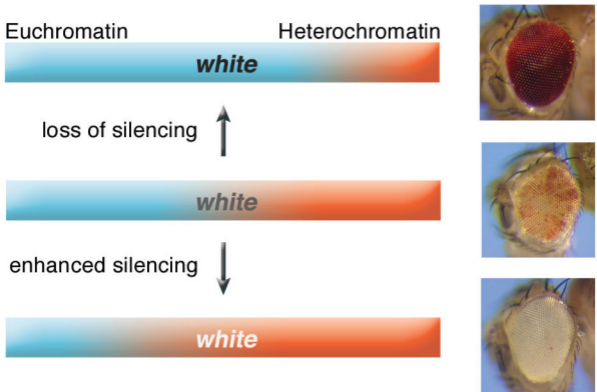


Figure 2. Dosage-dependent Effects of Some Modifiers of PEV

The modifiers of PEV that have a dosage-dependent effect are thought to be structural proteins of heterochromatin. Whereas a variegating phenotype (exhibited here by a *white* reporter gene) is seen when the wild-type modifier gene is present in two copies (*middle chromosome, middle fly eye*), the presence of three wild-type copies of the modifier gene will drive more extensive heterochromatin formation, resulting in an enhancement of reporter gene silencing (*lower chromosome, lower fly eye*). Conversely, the presence of only one wild-type copy of the modifier gene will result in less heterochromatin formation and more expression from the reporter gene (*upper chromosome, upper fly eye*).