A three dimensional population dynamics model for wild and transgenic mosquitoes that takes into account the heterogeneity of the mosquitoes will be presented. The model presented is a simplified form of a model presented by Jia Li where the death rates are assumed to be equal for all the mosquitoes. We study the stability of the fixed points of the system by considering dynamics of the ratio of homozygous wild to heterogeneous transgenic, and homogeneous transgenic to heterogeneous transgenic. (Received September 20, 2007)