

## ABSTRACT

Genetically modified organisms (GMOs) and Genetic Engineering (GE) technology has been around since mid 1990s. Numerous successful applications of genetically modified (GM) crops have been recorded in different parts of the world. The technology has been adopted steadily in several countries with acreage under GM crops steadily increasing in many cases. Socio-economic studies show GMO adoption result in improved productivity, reduced cost of labour, and reduced pesticide use. More than 20 years later and in spite of the foregoing, opposition to GMO remains almost the same especially in Kenya. Although the past few months have seen a move toward favourable enabling and political good will, a current report published in the economist magazine indicated that agricultural productivity in Africa and Kenya in particular has remained stagnant for the last 40 years. This points to the vulnerability of Kenya in ensuring food security for its growing population which has actually increased at least 6 folds since 1960s. For food security to be achieved, considerations should be given to traditional as well as modern technologies that can greatly increase productivity, in the shortest time possible, while also taking care devastating effects of pests, diseases, drought, poor soils, and climate change. The genetically engineered crops have been eaten by millions of people from around the world, and have also been fed to millions of animals and poultry all over the world. For Kenya to move forward toward sustainable food security, bold, deliberate actions based on sound science and embedded in the uniqueness of the Kenyan agricultural systems and culture ought to be taken into consideration. This paper reviews the matter of GM foods, their implications for Kenya and all the underlying factors meriting consideration.

**Key words:** Genetic engineering, Genetically modified organisms, Biotechnology, Biosafety, Public Acceptance, Kenya