
Question 21 (7 marks)

- (a) What is meant by the term *ecologically sustainable food production*? 2

Ecologically sustainable food production refers to manufacturers producing food products that are not detrimental to the environment, that is, producing foods that are not made of harmful chemicals, or that produce pollutants, which could damage the environment. An example of an ecologically sustainable food production, is a breakfast cereal produced in a biodegradable bag and contained in recyclable cardboard.

- (b) Discuss the use of genetically modified crops in food production. 5

Genetically modified crops, are crops which have had a gene from a different plant or animal added to it, for beneficial reasons. These reasons could be that the new gene encodes higher yield or acts as a natural pesticide. Genetically modified crops, can be of a significant aid in food production as it can be used to ensure crop survival, which can in turn lead to more produce being made available to society, to ensure that the growing population receives the food supply it needs. An example of this is the Bt corn, having the Bt gene added which acts like a natural pesticide, allowing crop survival. However, many individuals question the ethics of genetically modified crops production, as they wonder if its really necessary, and if there will be any harmful repercussions from the use of these crops on natural crops grown in society. Many individuals also wonder if the genetically modified foods will cause any harm to the humans which eat them, and if it is really ethical to "play god."