

## Critical study of the theological incorrectness of the production of genetically modified foods

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**Abstract:** The world's population is growing exponentially, and people are facing significant problems such as hunger and extreme malnutrition. According to some people, the production of genetically modified foods can be a good solution to provide healthy and adequate food and, thus, solve global hunger. The production of genetically modified foods has faced much opposition. A group of opponents, by presenting theological reasons, consider the production of genetically modified foods to be immoral and disgusting on their own, regardless of the consequences. This paper seeks to examine and critique the most important theological reasons for opposing the production of genetically modified foods, such as playing the role of God, crossing species boundaries, violating the intrinsic value of plants and animals, and changing creation. The results show that these reasons are not sufficiently convincing and cannot prove the immorality of the production of genetically modified foods, although this is not necessarily the case.

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**Introduction:** Currently, the world's population is growing rapidly, reaching an estimated 8.1 billion by 2030 (United Nations, 2015). As the population grows, the need for more food production is felt. Today, with the advancement of science and technology, food production methods are changing rapidly. Recent advances in biotechnology and genetic engineering have enabled the conscious manipulation of plant and animal genes and the production of genetically modified foods. The production of genetically modified foods has faced oppositions that are mostly concerned with ignored ethical issues in the production of genetically modified foods. Some opponents believe that the production of genetically modified foods has a catastrophic effect on the lives of human beings, animals and ecosystems and, as a result, the production of these products is immoral (Hilbeck et al, 2015; Zdziarski et al, 2018; Terefe, 2018). Others see the production of genetically

modified foods as flawed in themselves, regardless of the consequences. They believe that the genetic modification of plants and animals, which are the main sources of our food supply, is in itself inaccurate, and some of the reasons are theological. (Gottwald et al, 2010) Theological arguments are the arguments that followers of Christianity, Judaism, and Islam rely on to prove the falsity of genetically modified foods. This article aims to examine and critique the most important theological reasons against the production of genetically modified foods. One of the most important questions we are trying to answer in this article is: What are the most important theological reasons for the production of genetically modified foods? And what are the drawbacks to them? Can we argue against the immorality of producing genetically modified foods by relying on these reasons? Playing the role of God, crossing species boundaries, violating the intrinsic value of plants and animals, and changing divine

creation are some of the most important theological reasons opposing the production of genetically modified foods; all of these have their drawbacks.

**Methodology:** The research method is descriptive-analytical, using library resources. The production of genetically modified foods has faced negative arguments. Some opponents of the production of genetically modified foods believe that it has undesirable consequences and is immoral. Others see the production of genetically modified foods as flawed, regardless of the consequences. Due to the wide range of objections raised, this article examines and critiques four of the most important theological reasons raised against \ the production of genetically modified foods. To examine and critique these four reasons, first each argument is examined and below each argument its problems are stated.

**Findings:** Playing the role of God, crossing species boundaries, violating the intrinsic value of plants and animals, and changing divine creatures are among the most important theological reasons expressed in opposition to the production of genetically modified foods. One of the most common arguments against genetic modification is about the role of God. This is a general argument and is used to oppose all kinds of activities that lead to genetic modification. It has a history of biotechnological arguments. Almost every step forward in biotechnological research has faced this opposition. (Nordgren, 2010; Dabrock, 2009) The argument about the role of God is fraught with problems, such as the non-existence of creation in the production of genetically modified foods and the immorality of playing the role of God. Another major reason for opposing the production of genetically modified foods is the violation against the intrinsic value of plants and animals in the

process. Species are generally thought to be groups of individuals that are biologically related and have different lifestyles due to different genetic characteristics. Therefore, worrying about crossing species boundaries means worrying about mixing the genes of different organisms using genetic engineering. (Sandler, 2012: 130) The argument of crossing species boundaries is also not strong due to the ambiguity in species definition and the instability of species boundaries. Another major reason mentioned in opposition to the production of genetically modified foods is the violation against the intrinsic value of plants and animals in the process. According to this argument, modifying the genetics of plants and animals for the greater and better use of human beings is not right and reduces the status of these living organisms to the product, tool, and set of thousands of genes. Ethical discussions about the intrinsic value of living things are not specific to genetic engineering. These topics became popular in

the late twentieth century to study the suffering of animals in industrial animal husbandry and scientific experiments, and played an important role in promoting bioethics. (Whitelaw and Donald M, 2002). The first argument about violating the intrinsic value of plants and animals is also distorted. Intrinsic value means self-worth, and this meaning is not in conflict with being valuable to others. The last argument, the argument of change in the divine creatures, also appears in two forms: one deals with the lack of argument about the changed nature of living beings and the other with the shortcomings of the implication of verse 119 of Surah Nisa on the immorality of any change.

### **D**iscussion and Conclusion:

Examination and critique of theological arguments about the genetically modified food show that all of them are flawed and that the production of genetically modified foods cannot be considered inherently immoral. Some opponents also oppose the

production of genetically modified foods, citing the reasons why genetically modified foods are harmful to human beings, animals, and the environment. The final conclusion about whether it is ethical or immoral to produce genetically modified foods requires careful consideration of these reasons.

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