## The use of GM Food Products – Why?

Genetically modified foods are everywhere – during a typical grocery store strip, a majority of shoppers purchase GMOs without any clue as to what goes into their food. GMOs don't stop at the grocery store, many countries are planting GMOs that contain essential vitamins to prevent malnourishment. However, some believe that genetically modified foods are harmful, and are unfit for human consumption. Others state that eating GMOs is absolutely harmless. I, for one, believe that consuming GMOs is completely harmless, due to the wealth of research that has supported their safety.

GMOs have been eaten for decades due to the additional nutrition that they supply; GMOs are vital for sustaining some of the world's population that cannot obtain said nutrients in their diet. In the video, "Harvest of Fear", the topic of GMOs' and GM foods' safety is argued. While many have deemed GMOs as being dangerous, GMOs have had an extensive amount of research performed to prove their safety, and no tests have proved that GMOs are unsafe in any way. An example of this research is Monsanto Corporation's molecular tests on Bt pesticide corn: To prove the safeness of Bt corn to regular corn, Monsanto compared both Bt corn and regular, unaltered corn at the molecular level. It turned out that both corn specimens had the exact same molecular composition, thus proving that Bt corn is as harmless as regular corn. GMOs are also vital in countries that have a large amount of malnourishment in the population. An example of this is the use of golden rice, a GM rice that has been altered to carry vitamin A and beta carotene, which both prevent vision loss. Asia and Africa are now fed with golden rice to prevent further malnutrition in the population. Non-GM foods could not do the same, so why deem GM foods as being dangerous?

GM foods also make crop planting easier and healthier by omitting the use of pesticides and herbicides for natural alternatives. One example of this is Bt corn, a variant of corn that naturally produces the pesticide Bacillus thuriengiensis. Before this strain was produced, Corn was being sprayed with pesticides (which are PROVEN to be unsafe) liberally across fields, killing everything including beneficial insects. Now, pest resistance can be obtained through planting Bt corn. Another example of easier crop planting due to GMOs is the Papaya. The papaya was the first crop to ever be genetically modified to develop resistance against the papaya

ringspot virus, which threatened the papaya industry in the 1980s. Nowadays, the papaya ringspot virus is very uncommon in papayas due to the wonders of genetic engineering.

Some may argue that GMOs are harmful in some instances, such as the Cry9c corn incident. A strain of corn was produced with the protein Cry9c in order to prove that the protein was not an allergen. Unfortunately, the project was put on hold and the Cry9c corn was sent to farmers as animal feed only – even with labels stating so. Unfortunately, Cry9c corn was used for human consumption instead, and the protein was found in Taco Bell shells. Much controversy has surfaced about the use of GMOs since then, but the real reason why this happened was because of a lack of competence. The corn was clearly labeled as not being fit for human consumption, and yet it got through. The fault isn't towards GMOs, but towards the farmers that failed to comply with the instructions.

Why would GMOs be bad? GMOs have made many lives easier by giving individuals the nutrients they need and the ability to resist factors that could threaten crops as a whole. These reasons are why GMOs are everywhere and approved by most. So next time you visit the grocery store, ask yourself: would we be here without them?