

# **GM** Crops won't feed the world

February 2004

It has been a just over a year since the "hunger crisis" erupted in Southern Africa which again highlighted the ongoing threat to food security in that region, as well as the ongoing challenges facing those civil society organisations and Governments attempting to address those challenges. While the anticipated crisis did not emerge in Southern Africa, the global food and hunger situation has continued to deteriorate. According to the Food and Agriculture Organisation of the UN (FAO) and the World Food Program, 840 million people are now severely undernourished and 2 billion are food insecure. Food security continues to deteriorate in many countries, despite frequent intergovernmental resolutions to eradicate poverty and hunger.1

The response to this situation from the advocates of GM crops has been predictable and familiar: "we need GM crops to feed the starving poor in the developing world". assertion is untrue for many reasons, because it distorts both the present problems and the future solutions. GM crops are grown to sell on world markets. Rather than growing food to meet the needs of local communities for a healthy, diverse diet, industrial and GM agriculture use costly farm chemicals and machinery. While world crop production has trebled since the 1950s, more people go hungry now than 20 years ago. It has become a truism, but is no less true for all that: global hunger is not caused by lack of food, but rather by lack of the resources to grow it or the money with which to buy it. GM crops can solve neither of these basic problems. This has not stopped the GM advocates from making false claims for their crops.

This briefing sets out recent developments and new information relevant to this issue, starting with an analysis of the role (or lack of one) of GM crops in providing food to the hungry, then looks at real solutions which delivers control of their food to those who need it.

#### **Africa and GM Crops**

In Africa many claims have been made for the potential of GM crops, but usually these claims have be poorly substantiated. Research published by the Third World Network and The Institute for Development Studies has systematically analysed these claims for the three principle crops being developed for Africa: maize, cotton and sweet potatoes,2 employing criteria used to evaluate conventionally grown crops for their value in alleviating poverty. In each case, the utility of GM crops is low. This research reveals that claims made by the GM industry are not just contentious, but in some cases at least represent a conscious effort to distort the real situation on the ground.

In South Africa for example, Monsanto and the US government highlight the example "poor subsistence farmers" who have had success with GM crops. These farmers in fact are far from representative nor are they particularly poor - with large (by local standards) land holdings and far from modest additional assets. In Kenya, pro-GM researchers over play the documented production GM sweet potatoes while under reporting the yield of conventionally bred alternative varieties. This well referenced report goes far beyond the hyperbole of most GM advocates to raise serious questions about the role of the GM industry in one of the poorest and most vulnerable parts of the developing world.

#### GM, Ethics and the Developing World

<sup>&</sup>lt;sup>1</sup> See www.fao.org

<sup>&</sup>lt;sup>2</sup> www.twnafrica.org/docs/GMCropsAfrica.pdf



The conventional argument deployed in the promotion of GM crops in the developing world is that we Europeans in general and those in the developed world in particular have an "ethical" duty to make this technology available to solve the problems of world hunger. This notion is challenged in recent research conducted by the Food Ethics Council, the independent council for ethical standards in food and agriculture report *Engineering Nutrition*. The Food Ethics Council concludes that regulation of GM crops needs to be at least as stringent, if not more stringent, in the developing world than in the North. Research priorities have been skewed to reflect the technical aspects of hunger and GM issues rather than the broader social and political pathways - such as public participation in decision making - which are relevant to development. Finally, they point out the problems inherent in the domination of agricultural research by the private sector – around 80% of GM research is privately funded worldwide. "Intellectual property rights" are in fact "intellectually based monopoly privileges". Private goods are structurally poorly placed to supply public "goods" such as food sovereignty.

## **GM** Crops, part of the problem, not part of the solution

ActionAid, one the UK's leading development charities published research in May this year questioning the role of GM crops in alleviating poverty: *GM Crops – Going against the Grain.* Only 1% of the GM research is aimed at crops used by poor farmers in poor countries. Of that tiny percentage of potentially "useful" crops, they only have a one in 250 chance making it into a farmer's field. In Kenya alone, of 136 applications for intellectual property rights in plants, only one was for a food crop and more than half was for roses. GM crops not only increase costs to farmers, but also significantly increase their dependence on resources and inputs beyond their financial means and beyond their political control.

### The Real Green Revolution

The irony in all the claims being made for GM crops is that genuinely sustainable solutions to agricultural problems and challenges do exist and are increasingly well documented. Simple practical changes such as improving rainwater collection can increase harvests dramatically. Basic social measures are also critical. Between 1970 and 1995, provision of basic health care and improvements in women's status and education were responsible for nearly 75% of reductions in childhood malnutrition. Greenpeace and many others have brought together success stories that show just how much is possible by working with nature rather than against it.<sup>56</sup> The obstacles to overcoming the challenges of hunger are largely political, not technical. This research and others has shown that switching to sustainable farming methods increases harvests for these farmers by an average of 73%.<sup>5,7</sup>

Hunger in the developing world has been a part of the debate over the introduction of GM crops in the UK since the 1990s. Increasingly the deception that it is key to solving the problems of hunger has also been highlighted. GM Nation?,<sup>8</sup> the UK Government sponsored debate on GM conducted in summer 2003, showed that the more we engage with GM – whether its impacts on the environment as well as the potential for negative social and economic impacts in the developing world – the more cautious we become. Greenpeace opposes the release of GM crops because of the threat that they pose to the environment – whether in the developed or developing world, but the threat to the social and economic well-being of poor farmers also serves to underline and emphasise the threat of GM technology.

 $<sup>^3\ \</sup>underline{www.foodethicscouncil.org/reportspdf/gmnutrition/gmnutrition.pdf}$ 

www.actionaid.org/resources/pdfs/gatg.pdf

<sup>&</sup>lt;sup>5</sup> The Real Green Revolution www.greenpeace.org.uk/MultimediaFiles/Live/FullReport/4526.pdf

<sup>&</sup>lt;sup>6</sup> See the joint Oxfam / Greenpeace / ILIEA website www.farmingsolutions.org

<sup>&</sup>lt;sup>7</sup> Recipes Against Hunger - success stories for the future of agriculture <a href="http://archive.greenpeace.org/geneng/reports/hunger/brochure.pdf">http://archive.greenpeace.org/geneng/reports/hunger/brochure.pdf</a>

<sup>&</sup>lt;sup>8</sup> www.gmpublicdebate.org.uk