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MARKETING AND TRADE POLICIES FOR GENETICALLY MODIFIED PRODUCTS

LESSONS FROM SOUTH AFRICA

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This brief analyzes the past successes and recent challenges of South Africa's trade and marketing policies on genetically modified (GM) products, with the aim of drawing lessons for countries that are designing their biosafety systems.

A unique but challenging situation

South Africa is unique, as it is the only country in Africa that has produced GM crops for more than 10 years and also has a functional biosafety system to manage any risk related to the use of GM products. In addition, South Africa is one of the few countries that trades both GM and non-GM crops, despite being bordered by countries banning the use of GM products. For these reasons, South Africa's policies on GM products may be considered as relevant examples for other countries when creating their own biosafety systems. However, as GM production grows in South Africa, and as changes occur in political power and market conditions, the management of the marketing and trade of GM crops continues to evolve and the country's regulatory system is now facing challenges related to import, exports, and marketing.

Regulating imports of GM products

In the first years after the implementation of the GMO Act in 1997, South Africa successfully issued import approval (commodity clearance) for a variety of GM products after safety review. More recently, however, regulations have tightened. After rejecting importation of a GM maize event from the United States in 2004, based on an objection from a maize farmers' group, all new GM events have since had to pass the full approval procedure for environmental release. A rapid economic analysis of the reasons behind the measure points toward a non-tariff barrier to trade, unrelated to biosafety, which may have been costly for the animal feed industry, and for maize or meat consumers.

Maintaining exports and GM production despite trade restrictions

Of the 10 countries in the region with which South Africa trades the most, at least 7 have implemented restrictions on GM maize imports (Table 1), but testing is not systematic in all countries. A rapid trade analysis shows that the South African industry has been able to adapt to each country's specific demands, successfully exporting both GM and non-GM products. However, the increase of alleged export risks needing consideration in the decisionmaking process may become problematic: rejecting any GM application because of possible export risk is likely to result in fewer applications and fewer new developments of potentially beneficial products.

Accommodating different demands: Segregation and labeling

Because of the demand for non-GM products by consumers in some countries, the current international marketing system for maize, soybeans, or canola distinguishes a mixed "GM/non-GM" market channel from a pure "non-GM" market channel. In South Africa, the marketing channels for cotton and soybeans are largely GM, but non-GM maize represents a significant share of the maize supply. The segregation is done via identity preservation. In 2007, the customer price premium for non-GM maize was about 5 percent of the total maize price of US\$200, or US\$10/ton, of which the farmer would get about US\$3 and the trader certifier US\$7, but these prices were likely to increase with GM maize adoption. So, the South African marketing system has been successful thus far in providing the types of products that are in demand, but it will face new challenges as GM production expands.

Table 1. Reported information on border control of GM imports in the region.

Country	GM products	Import rule	Border control
Angola	Maize	No GM imports (2004)	Loose; possible tests; fines
Botswana	Maize	No GM imports, milled GM food aid	Loose; certificate; possible tests; fines
Malawi	Maize	No GM imports, milled GM food aid	Loose; no systematic test; fines over tolerance.
Namibia	Maize	No GM imports	Strict; certificate; possible tests; possible rejection
Swaziland	Maize	Changing GM acceptance/rejection for food aid	Unknown
Zambia	Maize	No GM imports; no GM food aid in 2002; milled GM food aid in emergency thereafter	Moderate; certificate; tests; fines
Zimbabwe	Maize, Soy blend	No GM imports; identity preserved requirements for non-GM; milled GM food aid in 2002, but no GM food aid thereafter	Strict; certificate; testing with PCR; fines, but no observed rejection, except for food aid

Source: Gruere and Sengupta (2008).

In 2004, South Africa introduced a labeling requirement for non-substantially equivalent GM products. As none of the current GM products in South Africa fits any of these characteristics, the only labeling used on GM products is based on private standards. A recent study showed, however, that many products with non-GM claims do in fact contain GM ingredients. Because of these limitations, the South African approach to GM food labeling is highly contentious. The main question relates to the use of voluntary versus mandatory approaches. Mandatory labeling would require food companies to label any GM products. Although largely applied, it may not be adequate in a country where most consumers are not aware of what “GM” or biotechnology means. Such a regulation could have the same effect as in OECD countries, where food processors and retailers have consequently avoided GM products altogether. In contrast, voluntary labeling would require rules to define non-GM products, and effectively discourage fraud for the benefit of consumers willing to pay to avoid GM. Recent developments suggest that South Africa may be considering a strict, European-style, mandatory labeling approach. Such requirements could have significant economic impact on GM producers in South Africa. They could also result in price increases at a time where inflationary food prices are already largely constraining South African consumers.

Conclusions and recommendations

South Africa is unique in its management of genetically modified crops and the products derived thereof. It is the only country in Africa with successful adoption of genetically modified (GM) crops, and with a fully functioning biosafety system to safely market, export, and import GM *and* non-GM crops. South Africa’s experience during the past 10 years has shown that the adaptation capacity and flexibility of its regulatory system has allowed the country to take advantage of biotechnologies under ever-changing global conditions. However, with the increasing influence of local special interest groups on decisionmaking, there has been a clear movement toward costly, more rigid trade and marketing regulations of GM products in South Africa. The following six policy recommendations suggest ways for South Africa to improve, rather than to rigidify, its market and trade regulations; to better adapt to global changes; to manage risks rigorously but also efficiently; and to continue to take advantage of new GM technologies:

1. Maintain commodity clearance as a separate option for GM commodity imports, based on rigorous scientific assessment, to reduce the price gap between domestic and international maize prices.
2. Diminish the weight of private export issues in the GMO Executive Council decisionmaking process and make sure the role of socioeconomic considerations in the decisionmaking process is clearly defined.
3. Support the establishment of a voluntary labeling rule that clearly defines what can be labeled GM or non-GM and encourages awareness programs and increased consumer information.
4. Encourage the South African Future Exchange to consider including a quote for non-GM maize.
5. Support the creation of a transparent monitoring system to provide timely information on regulatory and market changes on GM production and trade in other countries.
6. Continue to encourage the Southern African Development Community to move forward on adopting clear harmonized case-by-case rules on trade of GM products in the region.

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FOR MORE INFORMATION: Gruère, G., and D. Sengupta. 2008. Biosafety at the Crossroads: An Analysis of South Africa’s Marketing and Trade Policies for Genetically Modified Products. IFPRI Discussion Paper 00796, Washington, DC: International Food Policy Research Institute. Available at: <http://www.ifpri.org/pubs/dp/ifpridp00796.asp>

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