CASE 1

Monsanto Attempts to Balance Stakeholder Interests*

INTRODUCTION

When you think of Monsanto, the phrase *genetically modified* likely comes to mind. The Monsanto Company is the world's largest seed company, with sales of over $15.9 billion. It specializes in biotechnology, or the genetic manipulation of organisms. Monsanto scientists have spent the last few decades modifying crops—often by inserting new genes or adapting existing genes within plant seeds—to meet certain aims, such as higher crop yields or insect resistance. Monsanto develops genetically-engineered seeds of plants that can survive weeks of drought, ward off weeds, and kill invasive insects. Monsanto's genetically modified (GM) seeds have increased the quantity and availability of crops, helping farmers worldwide increase food production and revenues.

Today, 90 percent of the world's GM seeds are sold by Monsanto or companies that use Monsanto genes. Monsanto also holds a 70 to 100 percent market share on certain crops. Yet Monsanto has met its share of criticism from sources as diverse as governments, farmers, activists, and advocacy groups. Monsanto supporters say the company creates solutions to world hunger by generating higher crop yields and hardier plants. Critics accuse the multinational giant of attempting to take over the world's food supply and destroying biodiversity. Since biotechnology is relatively new, critics also express concerns about the possibility of negative health and environmental effects from biotech food. A Harris Poll shows that Monsanto is considered to be the fourth most hated company in the United States. However, these criticisms have not kept Monsanto from becoming one of the world's most successful businesses.

This analysis first looks at the history of Monsanto as it progressed from a chemical company to an organization focused on biotechnology. It then examines Monsanto's current focus on developing GM seeds, including stakeholder concerns regarding the safety and environmental effects of these seeds. Next, we discuss key ethical concerns, including organizational misconduct and patent issues. We also look at Monsanto's corporate responsibility initiatives. We conclude by examining the challenges and opportunities that Monsanto may face in the future.

*This case was prepared by Jennifer Sawayda and Danielle Jolley for and under the direction of O. C. Ferrell and Linda Ferrell © 2015. It was prepared for classroom discussion rather than to illustrate either effective or ineffective handling of an administrative, ethical, or legal decision by management. All sources used for this case were obtained through publicly available material.

HISTORY: FROM CHEMICALS TO FOOD

Monsanto was founded by John F. Queeny in 1901 in St. Louis, Missouri. He named the company after his wife, Olga Monsanto Queeny. The company's first product was the artificial sweetener saccharine, which it sold to Coca-Cola. Monsanto also sold Coca-Cola caffeine extract and vanillin, an artificial vanilla flavoring. At the start of World War I, company leaders realized the growth opportunities in the industrial chemicals industry and renamed the company The Monsanto Chemical Company. The company began specializing in plastics, its own agricultural chemicals, and synthetic rubbers.

Due to its expanding product lines, the company's name was changed back to the Monsanto Company in 1964. By this time, Monsanto was producing such diverse products as petroleum, fibers, and packaging. A few years later, Monsanto created its first Roundup herbicide, a successful product that propelled the company even more into the spotlight.

However, during the 1970s Monsanto encountered a major legal obstacle. The company had produced a chemical known as Agent Orange, which was used during the Vietnam War to quickly deforest the thick Vietnamese jungles. Agent Orange contained dioxin, a chemical that caused a legal nightmare for Monsanto. Dioxin was found to be extremely carcinogenic, and in 1979 a lawsuit was filed against Monsanto on behalf of hundreds of veterans who claimed they were harmed by the chemical. Monsanto and several other manufacturers agreed to settle for $180 million, but the repercussions of dioxin continued to plague the company for decades.

In 1981 Monsanto leaders determined that biotechnology would be the company's new strategic focus. In 1986 Monsanto successfully spliced bacterium DNA into a seed. The bacterium was lethal to certain types of insects that feed on corn, potatoes, and cotton. The quest for biotechnology was on, and in 1994 Monsanto introduced the first biotechnology product to win regulatory approval. Soon the company was selling soybean, cotton, and canola seeds engineered to be tolerant to Monsanto's Roundup Ready herbicide. Many other herbicides killed good plants as well as the bad ones. Roundup Ready seeds allowed farmers to use the herbicide to eliminate weeds while sparing the crop.

In 1997 Monsanto spun off its chemical business as Solutia, and in 2000 the company entered into a merger and changed its name to the Pharmacia Corporation. Two years later, a new Monsanto, focused entirely on agriculture, broke off from Pharmacia, and the companies became two legally separate entities. The company before 2000 is often referred to as "old Monsanto," while today's company is known as "new Monsanto."

The emergence of new Monsanto was tainted by disturbing news about the company's conduct. For nearly 40 years the Monsanto Company had released toxic waste into a creek in the Alabama town of Anniston. The company had also disposed of polychlorinated biphenyls (PCBs), a highly toxic chemical, in open-pit landfills in the area. The results were catastrophic. Fish from the creek were deformed, and the population had elevated PCB levels that astounded environmental health experts. A paper trail showed that Monsanto leaders had known about the pollution since the 1960s but had not stopped the dumping. Once the cover-up was discovered, thousands of plaintiffs from the city filed a lawsuit against the company. In 2003 Monsanto and Solutia agreed to pay a settlement of $700 million to more than 20,000 Anniston residents.

When current CEO Hugh Grant took over in 2003, scandals and stakeholder uncertainty over Monsanto's GM products had tarnished the company's reputation. The price of Monsanto's stock had fallen by almost 50 percent, down to $8 a share. The company had

lost $1.7 billion the previous year. Grant knew the company was fragile and decided to shift its strategic focus. Through a strong strategic focus on GM foods, the company has recovered and is now prospering.

In spite of their controversial nature, GM foods have become popular in developed and developing countries. Monsanto became so successful with its GM seeds it acquired Seminis, Inc., a leader in the fruit and vegetable seed industry. The acquisition transformed Monsanto into a global leader in the seed industry. Today, Monsanto employs approximately 22,000 people worldwide. It is recognized as one of the 100 best corporate citizens by *Corporate Responsibility Magazine*.

MONSANTO'S EMPHASIS ON BIOTECHNOLOGY

While the original Monsanto made a name for itself through the manufacturing of chemicals, the new Monsanto took quite a different turn. It changed its emphasis from chemicals to food. Today's Monsanto owes its $15.9 billion in sales to biotechnology, specifically to its sales of GM plant seeds. These seeds have revolutionized the agriculture industry. Not content with resting on its laurels, Monsanto continues to use its $1.5 billion research budget to investigate new methods of farming at its 1.5-million-square-foot complex in Missouri.

Throughout history, weeds, insects, and drought have been the bane of the farmer's existence. In the twentieth century, synthetic chemical herbicides and pesticides were invented to ward off pests. Yet applying these chemicals to an entire crop was both costly and time consuming. Then Monsanto scientists, through their work in biotechnology, were able to implant seeds with genes that make the plants themselves kill bugs. They also created seeds containing the herbicide Roundup, an herbicide that kills weeds but spares the crops. Since then Monsanto has used technology to create many innovative products, such as drought-tolerant seeds for dry areas like Africa.

The company utilizes its technological prowess to gain the support of stakeholders. For example, Monsanto has a laboratory in St. Louis that gives tours to farmers. One of the technologies the company shows farmers is a machine known as the corn chipper, which picks up seeds and removes genetic material from them. That material is analyzed to see how well the seed will grow if planted. The "best" seeds are the ones Monsanto sells for planting. Monsanto is extending its reach into the computing industry as well. The company offers software and hardware that use big data to yield important information to help farmers in the field. It even provides recommendations on when and where to plant. Monsanto also arranges tours for its critics to help them understand the process of GM crops and their implications. Impressing farmers with its technology is one way Monsanto attracts potential customers.

However, GM crops are not without critics. Opponents believe influencing the gene pools of the plants we eat could result in negative health consequences. Others worry about the health effects on beneficial insects and plants, fearing that pollinating GM plants could affect nearby insects and non-GM plants. CEO Hugh Grant decided to curtail the tide of criticism by focusing biotechnology on products not directly placed on the dinner plate but on seeds that produce goods like animal feed and corn syrup. In this way, Grant reduced some of the opposition. The company invests largely in four crops: corn, cotton, soybeans, and canola. Monsanto owes much of its revenue to its work on GM seeds, and today more

than half of U.S. crops, including most soybeans and 90 percent of corn, are genetically modified.

Farmers who purchase GM seeds can grow more crops on less land and with less left to chance. GM crops have saved farmers billions by preventing loss and increasing crop yields. For example, in 1970 the average corn harvest yielded approximately 70 bushels an acre. With the introduction of biotech crops, the average corn harvest increased to roughly 150 bushels an acre. Monsanto predicts even higher yields in the future, possibly up to 300 bushels an acre by 2030. According to Monsanto CEO Hugh Grant, this increase in productivity will increase crop yields without taking up more land, helping to meet the world's growing agricultural needs.

Monsanto's GM seeds have not been accepted everywhere. Attempts to introduce them into Europe met with consumer backlash. The European Union banned most Monsanto crops except for one variety of corn. Consumers have gone so far as to destroy fields of GM crops and arrange sit-ins. Greenpeace has fought Monsanto for years, especially in the company's efforts to promote GM crops in developing countries. Even China placed bans on certain GM corn imports, although it has since relaxed the ban and appears to be encouraging more acceptance of GM crops among its citizens. This animosity toward Monsanto's products is generated by two main concerns: the safety of GM food and the environmental effects of genetic modification.

Concerns about the Safety of GM Food

Of great concern to many stakeholders are the moral and safety implications of GM food. Many skeptics see biotech crops as unnatural, with the Monsanto scientist essentially "playing God" by controlling what goes into the seed. Because GM crops are relatively new, critics maintain that the health implications of biotech food may not be known for years to come. They also contend that effective standards have not been created to determine the safety of biotech crops. Some geneticists believe the splicing of these genes into seeds could create small changes that might negatively impact the health of humans and animals that eat them. Also, even though the Food and Drug Administration (FDA) has declared biotech crops safe, critics say they have not been around long enough to gauge their long-term effects.

One concern is toxicity, particularly considering that many Monsanto seeds are equipped with a gene to allow them to produce their own Roundup herbicide. Could ingesting this herbicide, even in small amounts, cause detrimental effects on consumers? Some stakeholders say yes, and point to statistics on glyphosate, Roundup's chief ingredient, for support. According to an ecology center fact sheet, glyphosate exposure is the third most commonly reported illness among California agriculture workers, and glyphosate residues can last for a year. Yet the Environmental Protection Agency (EPA) lists glyphosate as having low skin and oral toxicity, and a study from the New York Medical College states that Roundup does not create a health risk for humans.

In March 2013 over 250,000 people signed a petition in response to President Barack Obama's signing of H.R. 933 into law. The new law, called the Agricultural Appropriations Bill of 2013, contains a provision that protects GM organisms and genetically engineered seeds from litigation concerning their health risks. In other words, courts cannot bar the sale of GM food even if future health risks are revealed. Critics of the provision claim the provision was slipped in at the last moment and that many members of Congress were not aware of it. For consumers, questions pertaining to the health risks associated with GM

crops have gone unanswered and are the primary reason the petition was started. Many people have called this bill the "Monsanto Protection Act" and believe it will help protect the survival of biotech corporations. Critics also say that the continuing resolution spending bill will no longer allow the court system to protect consumers, which could create a further disconnect between consumers and producers.

Despite consumer concerns, the FDA and the American Association for the Advancement of Science have proclaimed that GM food is safe to consume. The European Commission examined more than 130 studies and concluded that GM food does not appear to be riskier than crops grown by conventional methods. As a result of its research, the FDA has determined that Americans do not need to know when they are consuming GM products. Therefore, this information is not placed on labels in most states, although other countries, notably those in the European Union, do require GM food products to state this fact in their labeling. Some states in the United States have also entered the fight to have GM food labeled. For instance, a new law in Vermont was passed that now makes it mandatory for GM food to be labeled. Organizations who would be negatively impacted by the law have sued Vermont, claiming that the law creates burdensome costs for companies without any provable advantages to the consumer. Hawaii also tried to curb types of GM crops and require labeling, but a federal judge overturned the law.

Concerns about Environmental Effects of Monsanto Products

Some studies have supported the premise that Roundup herbicide, used in conjunction with the GM seeds called "Roundup Ready," can be harmful to birds, insects, and particularly amphibians. Such studies revealed that small concentrations of Roundup may be deadly to tadpoles. Other studies suggest that Roundup might have a detrimental effect on human cells, especially embryonic, umbilical, and placental cells. Monsanto has countered these claims by questioning the methodology used in the studies. The EPA maintains glyphosate is not dangerous at recommended doses. On the other hand, the World Health Organization (WHO) ruled that glyphosate probably does have the potential to cause cancer in humans. The finding caused Monsanto shares to drop 2 percent. Monsanto has challenged this assertion and wants to meet with WHO officials to discuss the findings.

As honeybees have begun to die off, critics are blaming companies like Monsanto and Bayer. They believe the companies' pesticides are killing off the good insects as well as the bad ones. While there is no definitive evidence that the honeybees are dying off due to pesticide use, opposition against Monsanto is rising as the honeybee population continues to decline. One of the projects in which Monsanto has invested is working with the Defense Advanced Research Projects Agency (DARPA) in developing mechanical bee-like drones that can be used to pollinate crops. Nicknamed Robobees, these drones could help with pollinating crops, which could lead to an increase in food crops. Opponents, on the other hand, claim Monsanto is killing the bees and will obtain even more power by gaining control of their mechanical substitutes.

Another concern with GM seeds in general is the threat of environmental contamination. Bees, other insects, and wind can carry a crop's seeds to other areas, sometimes to fields containing non-GM crops. These seeds and pollens might then mix with the farmer's crops. Organic farmers have complained that GM seeds from nearby farms have "contaminated" their crops. This environmental contamination could pose a serious threat. Some scientists fear that GM seeds spread to native plants may cause those plants to adopt the GM trait, thus creating new genetic variations of those plants that could negatively

influence (through genetic advantages) the surrounding ecosystem. A major dispute has arisen between vegetable farmers and Monsanto for just this reason. Monsanto and its competitor Dow Chemical are developing seeds to be resistant to stronger herbicides because plants are starting to become resistant to Roundup. However, these stronger herbicides have been known to drift to other farms after a farmer sprays his or her crops. While the special interest group Save Our Crops successfully convinced Dow to reformulate its herbicide to decrease the likelihood of drift, Monsanto maintains its resistant seeds will be able to coexist with other crops without a contamination problem.

Another controversy involves the discovery of a field in Oregon filled with an experimental form of Monsanto's GM wheat. The wheat was not approved by the United States Department of Agriculture. The discovery of this wheat raised concern over whether it could have contaminated U.S. wheat supplies. As a result, Japan temporarily instituted a ban on U.S. wheat. Initial investigations revealed that the wheat had been stored in a Colorado facility but were unable to provide an explanation for how it showed up in an Oregon field. Monsanto denied involvement and stated that it suspected someone had covertly obtained the GM wheat and planted it. The company also claims that this incident was an isolated occurrence. The altered wheat is not believed to have caused any damage, and Japan lifted the ban. However, some farmers filed lawsuits against Monsanto seeking class-action status.

Monsanto has taken action in addressing environmental and health concerns. The company maintains that the environmental impact of everything it creates has been studied by the EPA and approved. Monsanto officials claim that glyphosate in Roundup rarely ends up in ground water, and when it does contaminate ground water, it is soluble and will not have much effect on aquatic species. The firm has stated that it will not file lawsuits against farmers if GM crops accidentally mix with organic. Monsanto has also partnered with Conservation International in an effort to conserve biodiversity. Stakeholders are left to make their own decisions regarding GM crops.

Resistance to Pesticides and Herbicides

Another environmental problem that has emerged is weed and insect resistance to the herbicides and pesticides in Monsanto crops. On the one hand, it is estimated that GM crops have prevented the use of £965 million (approximately $1.5 billion) of pesticide use. On the other hand, critics fear that continual use of the chemicals could result in "super weeds" and "super bugs," much like the overuse of antibiotics in humans has resulted in drug-resistant bacteria. The company's Roundup line, in particular, has come under attack. GM seeds labeled Roundup Ready are engineered to withstand large doses of the herbicide Roundup. Because Roundup is used more frequently, weeds have started to develop a resistance to this popular herbicide. Significant numbers of Roundup resistant weeds have been found in the United States and Australia.

To combat "super bugs," the government requires farmers using Monsanto's GM products to create "refuges," in which they plant 20 percent of their fields with a non-GM crop. The theory is that this allows nonresistant bugs to mate with those that are resistant, preventing a new race of super bugs. To prevent resistance to the Roundup herbicide, farmers are required to vary herbicide use and practice crop rotations. However, since Roundup is so easy to use, particularly in conjunction with Roundup Ready seeds, some farmers do not take the time to institute these preventative measures. When they do rotate their crops, some will rotate one Roundup Ready crop with another. As a result, agricultural pests such

as rootworm are becoming resistant to genes in GM crops intended to kill them. This resistance is causing some farmers to turn toward more traditional herbicides and pesticides. For the first time, regulators in the United States are encouraging limits on certain kinds of GM corn to prevent the spread of resistant bugs. The EPA acknowledges that farmers and seed companies have not done enough to curb resistance. It is recommending that 35 percent of fields be planted with another crop other than biotech corn. Resistance is of particular concern in Latin America, Africa, and Asia, where farmers may not be as informed of the risks of herbicide and pesticide overuse.

DEALING WITH ORGANIZATIONAL ETHICAL ISSUES

In addition to concerns over the safety of GM seeds and environmental issues, Monsanto has dealt with concerns about organizational conduct. Organizations face significant risks from strategies and employees striving for high performance standards. Such pressure sometimes encourages employees to engage in illegal or unethical conduct. All firms have these concerns. In the case of Monsanto, patents and other legal issues have resulted in legal, ethical, and reputational consequences.

Patent Issues

As bioengineered creations of the Monsanto Company, Monsanto's seeds are protected under patent law. Under the terms of the patent, farmers using Monsanto seeds are not allowed to harvest seeds from the plants for use in upcoming seasons. Instead, they must purchase new Monsanto seeds each season. By issuing new seeds each year, Monsanto ensures it secures a profit as well as maintains control over its property. This patent protection has become a controversial subject among farmers and has led to numerous litigation battles for Monsanto.

Throughout agricultural history, farmers have collected and saved seeds from previous harvests to plant the following year's crops. Critics argue that requiring farmers to suddenly purchase new seeds year after year puts an undue financial burden on them and gives Monsanto too much power. However, the law protects Monsanto's right to have exclusive control over its creations, and farmers must abide by these laws. When they are found guilty of using Monsanto seeds from previous seasons, either deliberately or out of ignorance, they are often fined.

Since it is fairly easy for farmers to violate the patent, Monsanto has found it necessary to employ investigators from law firms to investigate suspected violations. The resulting investigations are a source of contention between Monsanto and accused farmers. According to Monsanto, investigators deal with farmers in a respectful manner. They approach the farmers suspected of patent infringement and ask them questions. The company claims that investigators practice transparency with the farmers and tell them why they are there and who they represent. If after the initial interview is completed and suspicions still exist, the investigators may pull the farmer's records. They may bring in a sampling team, with the farmer's permission, to test the farmer's fields. If found guilty the farmer must often pay Monsanto. However, some farmers tell a different story about Monsanto and its seed investigators. They claim that Monsanto investigators have used unethical practices to get

them to cooperate. They call the investigators the "seed police" and say they behave like a "Gestapo" or "mafia."

In 2007 Monsanto sued Vernon Bowman, an Indiana farmer who Monsanto claims used second-generation Monsanto seeds to plant soybeans. Monsanto claimed its patent protection reaches past first-generation seeds and Mr. Bowman infringed upon its patent. In 2009 the court ruled in favor of Monsanto and ordered Bowman to pay $84,000 in damages. Mr. Bowman did not accept defeat, and in 2013 brought his case before the Supreme Court. The Supreme Court ruled in favor of Monsanto, representing a great victory for biotechnology companies.

Monsanto does not limit its investigations to farmers. It filed a lawsuit against DuPont, the world's second-largest seed maker, for combining DuPont technology with Roundup Ready. Monsanto won that lawsuit, but was countersued by DuPont for anticompetitive practices. These accusations of anticompetitive practices garnered the attention of federal antitrust lawyers. With increased pressure coming from different areas, Monsanto agreed to allow patents to expire on its seeds starting in 2014. This will allow other companies to create less expensive versions of Monsanto seeds. However, Monsanto announced it would continue to strictly enforce patents for new versions of its products, such as Roundup Ready 2 soybeans.

Legal Issues

Many major companies have government and legal forces to deal with, and Monsanto is no exception. The government has begun to examine Monsanto's practices more closely. In 1980 the Supreme Court allowed living organisms to be patented for the first time, giving Monsanto the ability to patent its seeds. Despite this victory, Monsanto came to the attention of the American Antitrust Institute for alleged anticompetitive activities. The institute suggested that Monsanto hinders competition, exerting too much power over the transgenic seed industry and limiting seed innovation. When Monsanto acquired DeKalb and Delta Land and Pine, it had to obtain the approval of antitrust authorities, and gained that approval after agreeing to certain concessions. As a result of complaints, the Department of Justice (DOJ) began a civil investigation into Monsanto's practices. Although the DOJ eventually dropped the antitrust probe, concerns over Monsanto's power continue. Monsanto must be careful to ensure that its activities cannot be seen as anticompetitive.

In early 2013 Monsanto settled with local residents in Nitro, West Virginia, after claims of health problems became persistent in a now-closed Agent Orange plant. The company agreed to spend up to $93 million on medical testing and local cleanup of as many as 4,500 homes. It also agreed to establish a medical monitoring program and will make additional money available to continue the program's operation for 30 years.

The most talked about litigation involving Monsanto is its constant battle with competitor DuPont. In the past, DuPont has filed multiple lawsuits against Monsanto. One lawsuit claimed Monsanto used its power and licenses to block DuPont products. In March 2013, the battle for dominance between these two companies was settled. A patent-licensing deal was reached and DuPont agreed to pay Monsanto at least $1.75 billion over the next 10 years. This payment enables DuPont to have rights and access to technology for genetically engineered soybeans that resist herbicides. DuPont will also obtain rights to combine patented genes from Monsanto with other genes to develop multiple crop traits. On the opposing side, Monsanto is given access to DuPont patents for corn defoliation and crop-disease resistance techniques. This settlement will hopefully create positive results for

farmers and enable the development of technologies that will aid in higher crop yields for years to come.

CORPORATE RESPONSIBILITY AT MONSANTO

Despite criticisms levied against Monsanto, a study has provided evidence that GM crops have greatly benefited farming. The study estimated that farmers who adopted GM crops have seen their profits increase to 69 percent higher than those who did not. Today, the public generally expects multinational corporations to advance the interests and well-being of the people in the countries where they do business. Monsanto has given millions of dollars in programs to improve communities in developing countries. In fact, *Corporate Responsibility Magazine* ranked Monsanto number 38 on its 100 Best Corporate Citizens list.

Monsanto created a Code of Business Conduct to provide guidance on the firm's ethical expectations and is concerned with maintaining integrity among its many different stakeholders. In 2003 the company adopted an additional Code of Conduct for its chief executives and financial officers and a Human Rights Policy in 2006 to ensure the rights of Monsanto employees and those in its supply chain. The company's Business Conduct Office is responsible for investigating cases of alleged misconduct as well as maintaining the company's anonymous hotline.

As part of Monsanto's culture, the company wrote a pledge informing stakeholders about what it sees as its ethical commitments. According to Monsanto, the pledge "helps us to convert our values into actions, and to make clear who we are and what we champion." Table 1 provides the values Monsanto pledges to uphold, including integrity, dialogue, transparency, sharing, benefits, respect, acting as owners to achieve results, and creating a great place to work.

As an agricultural company, Monsanto must address the grim reality that the world's population is increasing fast, and the amount of land and water available for agriculture is decreasing. Some experts believe our planet must produce more food in the next 50 years to feed the world's population than what has grown in the past 10,000 years, requiring us to double our food output. As a multinational corporation dedicated to agriculture, Monsanto is expected to address these problems. The company developed a three-tiered commitment policy: (1) produce more yield in crops, (2) conserve more resources, and (3) improve the lives of farmers. The company hopes to achieve these goals through initiatives in sustainable agriculture.

Sustainable Agriculture

Monsanto's CEO Hugh Grant has said, "Agriculture intersects the toughest challenges we all face on the planet. Together, we must meet the needs for increased food, fiber, and energy while protecting the environment. In short, the world needs to produce more and conserve smarter." Monsanto is quick to point out that its biotech products added more than 100 million tons to worldwide agricultural production in a 10-year period, and the company estimates that this has increased farmers' incomes by $33.8 billion. Monsanto also created partnerships between nonprofit organizations across the world to enrich the lives of farmers in developing countries. The company's goal is to double its core crop

TABLE 1: The Monsanto Pledge

Integrity
Integrity is the foundation for all that we do. Integrity includes honesty, decency, consistency, and courage. Building on those values, we are committed to:
Dialogue
We will listen carefully to diverse points of view and engage in thoughtful dialogue. We will broaden our understanding of issues in order to better address the needs and concerns of society and each other.
Transparency
We will ensure that information is available, accessible, and understandable.
Sharing
We will share knowledge and technology to advance scientific understanding, to improve agriculture and the environment, to improve crops, and to help farmers in developing countries.
Benefits
We will use sound and innovative science and thoughtful and effective stewardship to deliver high-quality products that are beneficial to our customers and to the environment.
Respect
We will respect the religious, cultural, and ethical concerns of people throughout the world. The safety of our employees, the communities where we operate, our customers, consumers, and the environment will be our highest priorities.
Act as owners to achieve results
We will create clarity of direction, roles, and accountability; build strong relationships with our customers and external partners; make wise decisions; steward our company resources; and take responsibility for achieving agreed-upon results.
Create a great place to work
We will ensure diversity of people and thought; foster innovation, creativity, and learning; practice inclusive teamwork; and reward and recognize our people.

Source: Monsanto Corporation, *Monsanto Code of Business Conduct,* http://www.monsanto.com/SiteCollectionDocuments/Code-of-Business-Conduct-PDFs/code_of_conduct_english.pdf (accessed April 20, 2015).

yields by 2030. Monsanto intends to achieve this goal through new product innovations such as drought-tolerant seeds and better technology. Two regions Monsanto is now focusing on are India and Africa.

The need for better agriculture is apparent in India, where the population is estimated to hit 1.3 billion by 2017. Biotech crops have helped improve the size of yields in India, and Monsanto has estimated that Indian cotton farmers using biotech crops earn approximately $176 more in revenues per acre than their non-biotech contemporaries. Monsanto launched Project SHARE, a sustainable yield initiative created in conjunction with the nonprofit Indian Society of Agribusiness, to improve the lives of 10,000 cotton farmers in 1,050 villages.

In Africa Monsanto partnered with organizations, scientists, and philanthropists to develop and introduce drought-tolerant and virus-resistant seeds for African farmers. For instance, the Monsanto Fund is working with scientists to develop cassava plants that are resistant to two common types of viruses. The cassava is an important food product for many African communities. As CEO Hugh Grant writes, "This initiative isn't simply altruistic; we see it as a unique business proposition that rewards farmers and shareowners." But not all view Monsanto's presence in Africa as an outreach in corporate responsibility.

Some see it as another way for Monsanto to improve its bottom line. Opponents see the company as trying to take control of African agriculture and destroy African agricultural practices that have lasted for thousands of years.

Charitable Giving

In 1964 the Monsanto Company established the Monsanto Fund. This fund contributes to educational opportunities and the needs of communities across the world. One recipient of the Monsanto Fund is Nanmeng Village in China. The company is helping to train farmers in the area about ways to improve agricultural methods and infrastructure development. The Monsanto Company also committed $10 million to provide fellowship opportunities for Ph.D. students seeking to get their degree in rice or wheat plant breeding.

Another program implemented by the company is the Matching Gifts Program. This program matches employee contributions to charitable and educational organizations, dollar-for-dollar, by the Monsanto Fund. The program matches a maximum of $5,000 per employee every year and includes organizations supporting the environment, arts and culture, and disaster relief, among many others.

In the first decade of the twenty-first century, Monsanto supported youth programs and donated nearly $1.5 million in scholarships to students wanting to pursue agriculture-related degrees. The company supports 4-H programs and the program Farm Safety 4 Just Kids, a program that teaches rural children about safety while working on farms. Monsanto also partnered with the organization Agriculture Future of America (AFA), providing more than $100,000 in scholarships to youth in eight states who want to pursue agricultural careers.

CONCLUSION

Monsanto faces challenges that it must address, including lingering concerns over the safety and the environmental impact of its products. The company needs to enforce its code of conduct effectively to avoid organizational misconduct. Monsanto also faces increased competition from other companies. The seed company Pioneer Hi-Bred International, Inc. uses pricing strategies and seed sampling to attract price-conscious customers. Chinese companies are formidable rivals for Monsanto since their weed killers began eating into some of Monsanto's Roundup profits. As a result, Monsanto announced plans to restructure the Roundup area of the business.

Yet despite the onslaught of criticism from Monsanto detractors and the challenge of increased competition from other companies, Monsanto has numerous opportunities to thrive in the future. The company is currently working on new innovations that could increase its competitive edge as well as benefit farmers worldwide. Monsanto has teamed up with a Danish biotechnology firm to develop microscopic organisms that could be used to aid plant growth and ward off pests. These microorganisms could be a possible alternative to GM seeds. The company is also taking advantage of big data and its potential uses for farming. Monsanto's inroads into the computing industry are likely to grow in the coming years.

Although Monsanto has made ethical errors in the past, it is trying to portray itself as a socially responsible company dedicated to improving agriculture. As noted, the company still has problems. The predictions from Monsanto critics about biotech food have not yet

come true, but that has not eradicated the fears among stakeholders. Non-GM food products are becoming more popular, despite their increased costs. Sales of non-GM food grew 28 percent in one year to about $3 billion in sales. Faced with the increasing popularity of organic food and staunch criticism from opponents, Monsanto needs to continue working with stakeholders to promote its technological innovations and eliminate fears concerning its industry.

QUESTIONS FOR DISCUSSION

1. Does Monsanto maintain an ethical culture that effectively responds to various stakeholders?
2. Compare the benefits of growing GM seeds for crops with the potential negative consequences of using them.
3. How should Monsanto manage the potential harm to plant and animal life from using products such as Roundup?

SOURCES

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