

For Immediate Release

From:

**Indigenous and farming communities in Oaxaca, Puebla, Chihuahua, Veracruz
CECCAM, CENAMI, ETC Group, CASIFOP, UNOSJO, AJAGI**

Mexico City, Mexico
October 9, 2003

Contamination by genetically modified maize in Mexico much worse than feared

* Contamination has been found in cornfields in the states of Chihuahua, Morelos, Durango, Mexico State, Puebla, Oaxaca, San Luis Potosí, Tlaxcala and Veracruz

* Analyses show contamination with the genetically modified (GM) variety *Starlink*, prohibited for human consumption in the United States

* Some plants found to show presence of two, three and four different GM types, all patented by transnational biotechnology corporations

* Mexican indigenous and farming communities demand a halt to corn imports, continuation of the moratorium on sowing GM maize, and rejection of the Bill on Biosafety currently before the Mexican Congress.

Representatives of indigenous and farming communities from the states of Oaxaca, Puebla, Chihuahua, Veracruz, and the Center for Studies on Rural Change in Mexico (CECCAM), Center for Indigenous Missions, (CENAMI), Action Group on Erosion, Technology and Concentration (ETC Group), Center for Social Analysis, Information and Popular Training (CASIFOP), Union of Organizations of the Sierra Juarez of Oaxaca (UNOSJO), Jaliscan Association of Support for Indigenous Groups (AJAGI) released the results of their own independent studies and conclusions on the presence of transgenic contamination in nine Mexican states: **Chihuahua, Morelos, Durango, Mexico State, San Luis Potosi, Puebla, Oaxaca, Tlaxcala and Veracruz. The analysis were carried out on 2,000 plants (in 411 groups of samples), from 138 farming and indigenous communities. In 33 communities (24% of total samples) from nine states, the tests found some presence of transgenes in native corn. The results show percentages of contamination that run from 1.5% to 33.3%, in a second round of analysis.**

In the nine states that tested positive, genetic contamination was found that coincides with the protein Bt-Cry9c, that identifies the corn variety *Starlink*, patented by Aventis (Bayer), prohibited for human consumption in the United States and nowadays taken off the market. In these same states, other strains of *Bacillus Thuringiensis* (Bt), used in creating transgenic Bt corn varieties by companies including Monsanto and Novartis/Syngenta, were found, as well as presence of the protein CP4-EPSPS patented by Monsanto and used to create corn genetically modified to resist herbicides.

The analyses were carried out with commercial detection kits of the Agdia brand, applying the DAS ELISA test. The first round of tests were done by the members of the communities and organizations themselves, with the technical assistance and support of biologists from the National Autonomous University of Mexico (UNAM). The second round of tests was carried out by a company that distributes the kits in Mexico.

“Our analyses confirm the findings of contamination of native corn that were released to the public previously by researchers Chapela and Quist of the University of California at Berkeley, and by the National Institute of Ecology (INE) and the National Council on Biodiversity (CONABIO). Now we see that the contamination has spread at least to the South, Central and Northern regions of the country,” stated Ana de Ita of CECCAM. She added, “This is just a small sample, but it indicates the seriousness of the problem. If we’re finding contamination in random samples from indigenous and farming communities far from urban centres and in communities that have traditionally used their own seed, then the problem is much more widespread. The presence of *Starlink* is especially serious because it ends up in the corn these communities consume. The plants in several communities that contain two, three and even four different transgenes together indicates that the contamination has been around for years, and that contaminated maize on small farms has been cross-pollinating for generations to have incorporated all these different traits in its genome.”

Silvia Ribeiro of ETC Group warned that “Recent U.S. production of corn genetically modified to produce substances ranging from plastics and adhesives, to spermicides and abortifacients poses an even greater risk of contamination. There have already been cases in Iowa and Nebraska of accidental escape of corn modified to produce non-edible substances. If we’re already finding contamination in remote areas of Mexico, where cultivation of GM corn is prohibited by law, how can we guarantee that these other types won’t spread as well?”

Ribeiro continued: “Like all GM products in the world, the proteins detected are all under patent. The Monsanto corporation that accounts for 90% of the world market in genetically modified agricultural products already won a lawsuit against Canadian farmer Percy Schmeiser claiming unlicensed use of their patent, even though Schmeiser’s fields were inadvertently contaminated by Monsanto’s GM canola. There are currently 2,000 similar cases filed by Monsanto and other biotech corporations against farmers in Canada and the U.S.”

Elizabeth, a peasant from the state of Veracruz, declared: “The companies themselves should be sued, for contamination. We publicly declare their responsibility, and we will not permit any lawsuit filed by them, in any part of Mexico, since they’re the ones who have damaged our corn with their genetically modified products.”

Pedro, an indigenous community member in Chihuahua, echoed a view expressed by many of the representatives of indigenous and farming communities affected, stating that for them the contamination of their corn is an attack on their most profound cultural roots and a threat to their basic source of sustenance and autonomy. “Our seeds, our corn, is the basis of the food sovereignty of our communities. It’s much more than a food, it’s part of what we consider sacred, of our history, our present and future.”

Baldemar Mendoza, an indigenous farmer from Oaxaca, reported at the news conference that deformed plants with GM traits have been found in Oaxaca and other states. “We have seen many deformities in corn, but never like this. One deformed plant in Oaxaca that we saved tested positive for three different transgenes. The old people of the communities say they have never seen these kinds of deformities.”

He also stated that government representatives came to his community to tell him not to worry about contamination, because GM crops have been available in some countries for five or six years and there is no evidence that GM crops are harmful to health. “But we have our own evidence,” asserted Mendoza. “We have 10,000 years of evidence that our maize is good for our health. To contaminate it with genetically modified maize is a crime against all indigenous peoples and farming communities who have been cultivating and improving maize over millennia for the benefit of humankind.”

Alvaro Salgado of CENAMI cited a Nahuatl poem that emphasizes the role of corn in Mexican communities: “It is our mother because it gives us life; it gives us unity and identity, as children of the same family. It makes us love our mother earth and not abandon her. It makes us peoples. We share the maize with joy, but nobody has the right to use it as its owner, maize can feed us all, but we cannot appropriate it. We have a mutual relationship, that’s why we defend it from foxes, coyotes and rats. We don’t want it to run out, because we exist thanks to corn.”

“Contamination isn’t just one more problem”, said Salgado. “It’s an aggression against Mexico’s identity and its original inhabitants. That is why the communities and organizations have decided to take matters in their own hands. We won’t let the same technicians and institutions and companies that gave us chemicals and hybrid seeds come along now to tell us not to worry and that the solution is their seeds. We want *our* seeds and we are going to defend them and rescue them.”

Carlos Chavez of AJAGI further noted: “In the two years that the government has known about the contamination, it hasn’t done anything to determine how far it has spread or to stop the sources of contamination. With the exception of the studies done by INE-CONABIO, it hasn’t released the results of governmental studies, like the ones carried out by the Ministry of Agriculture (SAGARPA).” Chavez also noted that Victor Villalobos, the Ministry’s delegate in the Intersecretarial Commission for Biosafety and Genetically Modified Organisms (CIBIOGEM) stated publicly that “contamination in Oaxaca is a natural laboratory” and called for lifting the moratorium on sowing genetically modified maize in national territory.

“This would only help the five or six multinationals producing GM corn.” Chavez said. Meanwhile, the Senate approved a bill on Biosafety with no discussion and with the support of all the political parties. Instead of protecting Mexico’s interests, this bill protects the multinationals that contaminate us, and rejects the precautionary principle although this should be the major priority in our country since Mexico is a mega-diverse country and centre of origin for corn and other food crops. Out of respect for indigenous peoples, small farmers and all Mexicans, this bill should not be approved in the Chamber of Deputies, where it is currently under discussion. What we need in Mexico is to say NO to genetically modified crops—they contaminate native varieties, they make us dependent and we don’t need them.”

He added that, “Even international institutions like the International Center for the Improvement of Maize and Wheat (CIMMYT), which has the largest public seed bank for maize in the world gathered from small and indigenous farmers, have failed to publicly recognize that contamination exists but at the same time it has projects to develop GM maize and wheat. They are betraying what they say is their mission: to serve poor farmers.”

CECCAM’s Ana de Ita summed up the demands of the organizations and communities involved in the study:

- Total rejection of genetically modified crops
- Rejection of the bill on biosafety before Congress, which would only legalize genetic contamination
- Hold the multinational producers of GM products, particularly Monsanto, Syngenta, Bayer, Dupont, Dow and BASF, responsible for the contamination. We reject their lawsuits for “unlicensed use of patents,” that are in direct violation of farmers’ rights.
- The Mexican government and the Ministry of Agriculture, Livestock, Fisheries and Food (SAGARPA) must make public all the results of studies of contamination.
- Maintain the moratorium on cultivating and freeing GM maize into the environment

- Immediate halt to importations of GM corn, the most likely source of contamination
- Indigenous and farming communities, supported by the organizations they choose, will take specific actions to stop and reverse GM contamination. We invite all indigenous and farming communities to join the movement to defend our maize.

Indigenous and farming communities in Chihuahua, Puebla, Oaxaca, Tlaxcala, Veracruz and other states

CECCAM (Center for Studies on Rural Change in Mexico)

CENAMI (National Center to Support Indigenous Missions)

ETC Group (Action Group on Erosion, Technology and Concentration)

CASIFOP (Center for Social Analysis, Information and Popular Training)

UNOSJO (Union of Organizations of the Sierra Juarez of Oaxaca)

AJAGI (Jalisco Association of Support for Indigenous Groups)

Summary of results of the tests for genetic contamination of native corn, Mexico 2003

The analysis were carried out on 2,000 plants (in 411 groups of samples), from 138 farming and indigenous communities. In 33 communities (24% of total samples) from the states of Chihuahua, Morelos, Durango, Mexico State, San Luis Potosi, Puebla, Oaxaca, Tlaxcala and Veracruz, the tests found some presence of transgenes in native corn.

All the communities that participated in this study practice campesino, or small-scale agriculture, using family labour, and little or no chemical inputs. The corn produced is destined primarily to family consumption and is sown on plots of between one and two hectares, using their own stores of saved native seed. Most of the communities are located in regions far from urban centres. Each one of the communities participating in the study defined the size of its sample and the plants were selected at random, taken from the corners and centre of each plot.

In January 2003, 105 groups of leaves from 520 plants were analysed from the states of Puebla, Veracruz, Chihuahua, San Luis Potosí, Mexico State and Morelos. In August of 2003, additional samples from the state of Tlaxcala were analysed that also tested positive using the same method described below.

Based on tests to determine the presence of endotoxins through the **DAS-ELISA technique, using commercial kits manufactured by Agdia**, with a reader of optical density and a filter of 620 nm, the first test was carried out to determine the presence or absence of five types of proteins that are present in GM organisms. Four of these detect the toxin *Bacillus Thuringiensis*: Bt-Cry 1Ab/1Ac, Bt-Cry9C, Bt-Cry 1C y Bt Cry2a, and one detects herbicide-resistant CP4 EPSPS.

Of these 105 samples, gathered from 95 plots in 53 communities, 48.6 % tested positive for transgenic proteins. 17% of the samples were positive for three or more, 13% were positive for two or more, and 18.6% for one.

Of the total of samples analysed, in 21% Cry 1a/1ac was detected, among other things, and 26.67% tested positive for Cry9c (Starlink). Another 34% were positive for CP4 EPSPS.

In July/August 2003 a second study was carried out on 306 samples, made up of groups of leaves from 1,500 plants and using samples from the corners and centres of fields located in 101 indigenous communities in six Mexican states: Oaxaca, Puebla, Chihuahua, Durango and Veracruz.

The study sought to determine the presence of endotoxins through the **DAS-ELISA technique, and was done by the laboratory Fumigaciones y Mantenimiento de Plantas S.C., using the Agdia commercial kits**, with a reader of optical density and filter of 620 nm, diagnosing the presence or absence of three types of proteins indicators of the presence or absence of the toxin Bt that produces insect-resistant plants (Bt-Cry 1Ab/1Ac, Bt-Cry- 9C, Bt-Cry 1C) and one resistant to herbicides (CP4 EPSPS).

Of the 306 samples in total in this case—from all the communities and points of sampling—32 samples (10.45%) tested positive. 1% of the samples registered the protein Bt-Cry 1Ab/1Ac; 1% of the samples registered the protein Bt-Cry 9C; 3.6% were positive for resistance to herbicides CP4 EPSPS. 4.9% of the samples were positive concomitantly for two or three different transgenes: 3.9% of the samples for three types—two different types of Bt (Bt-Cry9C, Bt Cry 1Ab/1Ac) and the herbicide resistant CP4 EPSPS; while 0.65% of the samples registered the presence of two transgenic characteristics: CP4 EPSPS and Bt-Cry 1Ab/1Ac. The remaining 0.33% was positive for CP4 EPSPS and Bt-Cry 9C.

In 18 of the 105 sample groups, between 1.5% and 33.3% of the samples registered positive results. Deformed plants have been found in the states of Oaxaca and Chihuahua that have tested positive for the presence of GM products.

Some commercial brands and companies that market GM products containing transgenes found in Mexican maize:

Bt-Cry- 9C present in the maize *Starlink* of **Aventis (owned by Bayer)**, prohibited in the United States for human consumption;

Bt-Cry 1Ab/1Ac, present, among other commercial brands in the products *YieldGard* from **Monsanto**, *Knockout* from **Novartis (owned by Syngenta)**, and *NatureGard* from **Mycogen**;

Bt-Cry1C in products from **Mycogen y Ecogen**.

CP4 EPSPS that identifies, for example, the GM maize resistant to herbicide *RoundUp Ready Corn* from **Monsanto**, (resistant to the herbicide glyphosate, known locally as *Faena* or *Basta*).

For further information, contact:

ETC Group in Mexico: (+52-55) 55 63 26 64), silvia@etcgroup.org

CECCAM (+52-55) 5661 1925 , ceccam@laneta.apc.org

CENAMI, cenamidad@terra.com.mx