

CAN INDIA HANDLE GM TECHNOLOGY?^{i,ii}

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If proof were needed that India was not ready to absorb and implement a complex technology like GM technology, one only has to watch the performance of the agencies set up to regulate this sensitive technology, the GEAC (Genetic Engineering Approval Committee) in particular. The GEAC had convened a meeting on 7 November, 2002 to grant approval to Proagro's GM mustard varieties. NGOs and farmers organisations raised a storm of protest before and during the meeting, opposing the release of the GM mustard. The committee decided to defer the decision, ostensibly to 'review' the data.

It is believed that the decision was delayed so as to ride out the protests and clear the variety when things were quiet again. Amidst a barrage of allegations that the GM mustard had not cleared safety tests and not been sufficiently tested in the fields, NGOs like Gene Campaign had been demanding the release of the field data presented by Proagro, and that the company should be required to do new field tests monitored by independent experts. The GEAC has been adamant that no data would be released and no further field trials would be done. Now suddenly, with nothing having changed, it has decided to hold a meeting on 10 December to take a decision on the GM mustard variety.

In the meantime, the conduct and bias of the GEAC has come in for criticism from an unlikely source. Dr. Panjab Singh, Director General of ICAR (Indian Council of Agricultural Research) has said that the mustard data are not sufficient to justify commercial release and that additional tests would have to be done, specially since most of the data provided to the GEAC have been generated by the company itself. Dr. Singh added "no exceptions can be made in the case of Proagro", implying that this had been the case. The clear cut conflict of interest – the industry providing the data on which its performance will be judged, does not seem to disturb the GEAC, so intent are they on granting approval to Proagro.

The GEAC is the regulatory body that is charged with the responsibility of assessing the results of field trials of GM crops and decide whether or not the results are clean and convincing enough to warrant approval for commercial release. This should not be a difficult task. There are supposed to be reference standards for testing GM crops, the field trial results have to be evaluated against these standards and a considered decision taken if the results are convincing. If not, more tests should be done. If even then the results are not clear, the Precautionary Principle should be invoked and the commercial release of the crop should be deferred or denied.

All this naturally needs to be done in an open and transparent manner and with accountability to the public. The laws of countries like the US, Canada, Australia and the EU have statutory provisions for public participation in decision-making, public discussions on risk and benefits of GM crops, the nature and location of field trials, the results of such trials and other aspects of the testing of GM crops. Most information (except some kinds of confidential Business Information) is in the public domain and access to that information cannot be denied to the public. Here in India however, the GEAC is a law unto itself. It functions like an insider club, cloaked in secrecy and about as transparent as a concrete wall. The GEAC refuses to respond to enquiries from the public. It even refuses to acknowledge phone calls, e mails and registered letters from civil society asking for appointments to discuss public concerns or requests for information about field trials of GM crops (Bt cotton or GM mustard). The question that many are asking is that the if the GEAC has nothing to hide, why is it so secretive, why is it hiding behind its concrete wall? And should such a secretive, non-transparent (and many would say, incompetent) body be allowed to take decisions of such importance?

Hiding facts about the GM field trials is a violation of India's Right to Information Act under which, barring sensitive areas like defence, the public has a right to know the basis of government conduct and its decisions. In an area which could so directly impact on the health of humans and their livestock, on the agro-biodiversity and the environment of this region, on the livelihoods of farmers and on the sustainability of agriculture for future generations, withholding information and denying the public the right to participate in taking decisions amounts to a criminal offence. If for nothing else, the GEAC should be called up to explain its conduct on this alone.

But this is not all. The way the scientific administration and the regulatory agencies responsible for evaluating the GM crops on offer from the MNCs (there are no crops yet from public research institutions) are conducting themselves, should be the subject of investigations by the Central Vigilance Commission. In fact, fearing corruption and irregularities, civil society organisations have petitioned the Chief Vigilance Commissioner to institute an enquiry into the behaviour of the regulatory agencies concerned with GM crops.

It is commonly known that when government officials go to monitor the field trials and tests of the GM crop (in this case , Monsanto's Bt cotton and Proagro's GM mustard) , the entire bill for travel, boarding and lodging and hospitality is paid by the industry whose crop is being evaluated. This is not all. The officials are also paid an honorarium! Talking about irregularities, to assess whether the GM crop parts like seeds, leaves , oil, oil cake etc are safe for humans and animals, studies have to be conducted to see whether they are toxic or not. The cost of these studies on the safety of GM crop products and crop parts for food and animal feed is borne by the concerned industry. This must be the only instance in the world where the industry in question itself controls the data on which the sanction of its product depends.

The conflict of interest within the government agencies running the GM show does not end here. Within the GEAC, all the members are those who are researching GM crops and hope to have their own GM crops coming up for approval before the same committee. A very 'I scratch your back- you scratch -mine' situation. A senior scientist of the ICAR is a member of the GEAC when ICAR itself is an applicant to the GEAC seeking approval for its transgenic crops. What objectivity should one expect in such a situation? In addition to this, there are no scientists from different fields like social sciences, economics, etc. who would be needed to bring in other perspectives.

The GEAC has no soil scientists or ecologists or entomologists (to understand insect resistance, as in the case of Bt cotton for example.), nor experts in any of the environmental sciences. The body is incapable of taking a competent or comprehensive view on the safety and efficiency of the GM crop on the basis of the data provided.

GENE CAMPAIGN DEMANDS:

1. Before India's regulatory agencies precipitate an environmental or human health disaster with their incompetence and their great enchantment of multinational companies, they should be disbanded.
2. India should put on hold the release of GM crops until its regulatory procedure is demonstrably more competent and transparent.
3. The GEAC must be revamped. Its members must include a range of scientists from diverse fields that touch upon agriculture, environment and ecosystems. NGOs, farmers organisations and representatives of civil society must be part of the GEAC.
4. Independent scientific experts not working on GM crops must monitor field trials of GM crops.
5. All data obtained from field trials of GM crops must be made available to the public.
6. There must be a public discussion on the risks and benefits of the proposed crop and the traits that are to be deployed.

7. The farming community, especially women farmers, other stakeholders and members of the public must be included in the setting of the research agenda and decisions on crops and traits selected for GM research.
8. There must be a clear cut, standardised framework for the monitoring of GM crops and for risk assessment.
9. Provisions must be made for long-term environmental and ecological studies on the impact of GM crops both on agro ecosystems and natural ecosystems.
10. The Regulatory system should have definite and unambiguous penalty provisions to be applied in the case of violations so that the ridiculous spectacle of the Navbharat Bt cotton is not repeated.
11. There should be clear cut policy on the protection of Centres of Origin and Diversity.
12. The GM science establishment should prepare a long-term vision document, which should be discussed in a public forum, before any further steps are taken on GM crops.

ⁱ Sahai, S., (2003) Habitat Focus, No. 2, February-March 2003, pp3,8

ⁱⁱ Sahai, S., (2003), Can India Handle GM Technology, Gene Campaign