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# When Global meets Local

The Cartagena Protocol on Biosafety and public participation in India

Since the Earth Summit in 1992, a majority of international policy agreements focusing on environment sustainability and public well being recommend public participation in decision-making (Glover 2003). With this influence, Cartagena Protocol under the Convention on Biological Diversity was adopted in January 2000, and India ratified the Protocol in 2003. This paper examines the 'performing' of public participation in the domestic political landscape of agribiotechnology in India, considering the extent of influence that the Cartagena Protocol on biosafety has had as an international guiding principle.



### Poonam Pandey

A graduate in Biotechnology she has worked extensively on issues of Public participation, Regulation and Agribiotechnology in India during her M.Phil. at Jawaharlal Nehru University, New Delhi, India. Currently as a visiting Ph.D. scholar at IAS-STS Graz, her research focuses on anticipatory governance and Responsible Innovation in Nanobiotechnology.

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# Contextualizing the Cartagena Protocol and its emphasis on public participation

The Article 23 under Cartagena protocol unfolds as a model regulatory structure which recommends public participation as a means to reach unanimity at the national level in order to universalize the practice of biosafety to reduce trade barriers (Glover 2003). The model structure thus needs to be translated and appropriated to a particular national setting. In the process of translation, which is shaped by the interplay of global and domestic forces, the provision on public participation might serve various purposes. As a justificatory claim, public participation to develop and implement biosafety frameworks would be essential to develop robust, well informed decisions as citizens of a free society need to know about their surroundings and matters of concern (Ferrati 2007, Stirling 2008). In the light of decreasing faith in scientific authority owing to growing controversies, public participation could also be used as a legitimatory tool to reflect openness in decision making and broadly owned decisions and policies (Stirling 2008). On the surface it appears that the protocol provides a lot of space for domestic politics on biotechnology to shape a local and intrinsic mechanism of public participation. At deeper levels, when seen in relation to other articles of the same protocol and international regulations on trade of Living

Modified Organisms by World Trade Organizations, this space seems constricted. For example, the need to comply with a science-based understanding of risk and biosafety negates the possibility of considering uncertain and ambiguous dimensions of knowledge about risk (Glover 2003, Stirling 2008) as well as social dimensions of risk such as farmers' rights, corporate control, and farming practices. Clause I of Article 23 relies heavily on a 'deficit model' for knowledge-making about risk as it requires 'providing information and education to the public' rather than public engagement.

# Understanding biotechnology and public participation in India

The act of participation at the national level is shaped by the domestic culture of participation, socio-economic and political factors, which are influenced by the place that biotechnology and public participation hold in the socio-political imagination of the country. In the case of India, since independence science and technology have been seen as an opportunity to be exploited for progress and development of the nation. The scientocracy in contemporary India still feeds on Nehru's vision of post independence nation building (Kumar 2004). As per this vision, the only way for India to move beyond the clutches of poverty, illiteracy and underdevelopment is to embrace modern science and technology with open arms. The desire for rapid growth and development through industrialization and modernization and the socio-political imaginary of a salvation science made no space for the illiterate and ignorant public to have any say in the decision-making process. This left many issues unaddressed and marginalized. The rise of the Indian environmental movement and the NGOs in the 70s and 80s could be seen as a response to such marginalization (Guha 2013). Seen through the lens of development discourses, public participation in matters other than political elections is often unintended and unwelcomed by the state. Another dominant identity with which

Another dominant identity with which agribiotechnology was associated was of the Green Revolution. Presented promisingly by the supporters of agribiotechnology as

'Green Revolution to Gene Revolution' and the 'second Green Revolution', both narratives emphasized repeating the success of green revolution or reducing its negative impact. Public participation in this context holds the passive place of information and education delivery, as performed by the state controlled agriculture extension system during the Green Revolution. Considering that, no emphasis was given to expanding the understanding of information delivery in an area (agribiotechnology) that has already moved from state control to public-private alliance. For the opponents of agribiotechnology this discussion platform was filled with examples and concerns ranging from seed ownership and corporate control to threats to biodiversity and the uncertainty of science. Public participation unraveled as 'support' for GM crops in the early phase transforming into 'protest' due to negligence and incompetence of the state to address farmers and consumer concerns. The third story, which is more prevalent in elite circles, is of the 'knowledge society'. A knowledge society - being dependent on knowledgeable individuals as a primary wealth of nation as compared to natural resources in industrial societies – presents to the developing world a unique chance to 'catch up' with developed nations in international competence. For a conception of society which depends on publications and patents catering to the international knowledge market, local considerations are sometimes kept aside. Public participation for biotechnology in this understanding means a hindrance which delays the obvious and favorable process of attaining global excellence and recognition. In the absence of any other forum for public interaction with the state, public protests and courts in the form of Public Interest Litigations (PILs) emerged as the major sites and prominent means through which the public claims its agency in knowledge and decision making.

# Lost in Translation: public participation and agribiotechnology in India

The biotechnology and public participation debate in India presents three examples which differ considerably in terms of medium of participation, main channelizing institutions and actors, inter bureaucratic conflict between agencies concerned, representation of public, and opening or closing down of spaces for public participation. In the case of Bt cotton, the first and the only commercially available GM crop in



India, public participation occurred through a bottom up approach by the collective effort of NGOs and farmer organizations. Public protests and PILs are the main mediums through which participation was enacted. As required in the Cartagena Protocol, the science-based risk assessment for decision-making was the main object for contestation in the PILs, where the science of risk assessment (questioning the capacity to undergo risk assessments) as well as the science-based risk assessment (neglecting the

socio-cultural aspects) was scrutinized at length. At the government level, during this phase, public agency was constantly undermined on an unscientific, ignorant and emotional basis. In the second event – the Bt Brinjal consultation in 2010 – for the first time space was opened for public deliberation on issues of science and technology and was closed at the same time with a moratorium on Bt Brinjal due to lack of scientific evidence for risk assessment. The main channelizing agency for public parti-

cipation was the Ministry of Environment and Forests (MoEF), where Minister Jairam Ramesh withstood the criticism of scientists and allied agencies to enact an event under the guidelines of the Cartagena Protocol. The third event is the drafting of the Biotechnology Authority of India bill (BRAI), which has undergone several revisions due to objections by different actors. India was one of the few countries which enabled a sophisticated multi-tiered system of GMO regulation early on. The absence of public participation at any stage of regulatory process in this system points to an expert based, patronizing and control-oriented nature of state science. The criticism of the regulatory system by various stakeholders on the grounds of lack of capacity, transparency, asymmetry of representation, and neglect of important socioeconomic and cultural aspects created forces of change at the domestic level to open up spaces for public participation. Thus a restricted space for participation was opened in the form of internet based public comments on the bill. This space served an instrumental role in complying with the Cartagena Protocol, whereas in essence it closed down public participation on various fronts such as internet as the medium of information delivery, very limited duration of public comments, and highly technical and complicated language. In the west, ICTs have played a very important role in providing information as well as two way dialogues between the public, but they could not be taken as a rule of thumb in the case of developing countries like India. In terms of resources, the internet has not yet become an everyday thing in India and a majority of population still lacks access to the internet and the essential skills of its operation. Not only this, farmers do not relate to Radio, Television and other ICT sources as means of information and value personal communication over these sources. Also, the Department of Biotechnology being the main channelizing agency in this process was earlier accused of having a skewed interest towards the promotion of biotechnology, and tried to close down public space through various mandates. Skeptical of the role of the MoEF in the Bt brinjal debate, the BRAI bill tries to dilute the power and interference of MoEF in decisions related to the commercialization of GMOs. The bill also tries to close down the spaces of public agency and participation through restrictions on PILs and public protests on the basis of unscientific grounds.

# **Concluding Remarks**

The Cartagena Protocol on biosafety with its provision to ensure public participation in regulatory decision-making gives interesting insights into how a tool-kit model of one-size-fits-all could be guided by poor consideration of local and national dynamics of the context in which it seeks compliance. This however does not negate its relevance as watchful-eyes of international governance in shaping domestic policies. This is increasingly significant for developing countries where other issues of socio-

cultural importance could be undermined in the mad-rush to promote technology as the band wagon of progress, development and international competitiveness. The three examples illustrated above suggest that the science and society relationship in India is in constant flux and its unfolding to engage the agency of the public depends on national and international dynamics of power in an ideational and material domain. In such a situation, what needs to be emphasized is an in-depth engagement of the Cartagena Protocol with the socio-political and cultural meanings of public participation in the national context, to make them more robust and effective.

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