

# **Democratizing risk assessments for biosafety**

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# Growing doubts about validity of biosafety risk assessments

- **Increasing uncertainty and complexity**

- The traditional approaches of risk management and cost benefit analysis are inadequate *'when we don't know what we don't know'* and where *'we don't know the probabilities of possible outcomes'*

- **Lack of trust in professional expertise and science**
  - people in industrialised and post-industrialised countries no longer view science as representing certain knowledge
  - recent crises over BSE ('mad cow disease') and GMOs have seriously undermined public confidence in scientific expertise
  - evidence of collusion between some key government scientific experts and the commercial interests of industry.

# Widespread corporate influence on scientific research and policy

- **Union of Concerned Scientists** describes 100 examples of corporate interference with science in USA
- 2012 UCS report *Heads They Win, Tails We Lose*

## Methods of abuse:

- Corrupting the Science
- Shaping Public Perception
- Restricting Agency Effectiveness
- Influencing Government
- Influencing Judicial System

# A need to expand democracy in risk assessments for biosafety

- **Crisis of political legitimacy.** In many countries, representative democracy has been heavily criticized for its inability to protect citizens' interests
- **Human rights and citizen empowerment**
  - democratic accountability enhanced when the policy making and the design of technologies involve inclusive deliberation
  - 'human right' to participate, - as citizens -, in policy decisions and risk assessments

# Democratizing risk assessments



- **Democratising science and technology** research and more funds for public system
- **Strengthen horizontal networks of farmers & citizens** for autonomous research, learning and action

# Democratizing public research & risk assessments

## Reforms by governments to:

- protect scientists from retaliation and intimidation by corporations
- make government more transparent and accountable
- reform the regulatory process
- and strengthen monitoring and enforcement against corruption and privatisation of science

# Democratizing public research & risk assessments

- Advocacy for more funds for public research & risk assessments
- Citizen/farmer participation in research and its governance – setting upstream priorities; co-production of knowledge; risk assessments...
- Methods for citizen participation in risk assessments e.g. citizens' juries

# GMO risks in Mali



# Institutionalizing citizen participation in national risk assessments

- Presupposes:
  - Cognitive justice between different knowledge systems
  - Transforming research organizations (culture, operational procedures, incentives and rewards, ways of working ...)

# **Strengthening self-managed research and grassroots risk assessments**

- Strengthening farmer networks for research and horizontal spread of grassroots research & risk assessments
- Give farmers/citizens enough material security and free time to engage in and participate in the entire research and risk assessment cycle

# Strengthening self-managed research and grassroots risk assessments

- Horizontal networks of farmers and citizens producing knowledge in fields, workshops, villages and ‘living campuses’
  - *Campesino a campesino* movements in Central America and Cuba
  - Citizens victims of pollution developing a peoples’ epidemiology in Europe
  - Global open source community developing new computer software

# Peoples' biosafety risk assessments: key processes

- Horizontal networks and decentralized knowledge production in rural and urban areas
- Critical adult education – e.g. Paulo Freire inspired pedagogies for Farmer Field Schools
- *Dialogo de saberes* – dialogue of different knowledges and ways of knowing
- Production of practical and political knowledge
- Extended peer review to validate knowledge on risks etc
- A process that strengthens local organisations and federations



**Merci!**  
**Thank you!**