

Perceptions and Public Policy: From Risk Communication to Engagement

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The Leverhulme Trust





PLEASE KEEP OUT

**HELP CONTROL
FOOT & MOUTH
DISEASE**

**FARMERS
GUARDIAN**

Northumbria
HARTFORD

**FOOT AND MOUTH
DISEASE ORDER 1983**

FOOT AND MOUTH DISEASE (FMD) is a highly infectious disease for livestock.

Spread of Foot and Mouth Disease is not confined to Northumbria and is a highly infectious disease for livestock.

CONTROLLED AREA

THIS PATH IS PROHIBITED

Controlled Area Order is an offence under the Act of 1983.

Notes

County Council Veterinary Office
Hartford Road, Hartford
Northumbria, Newcastle
NE17 9BQ

Ministry of Agriculture, Fisheries and Food
Helpline: 0845 9504141





Risk Controversies are no Longer Solely about Harm and its Likelihood (if they ever were)

But are rooted in:-

- Social and historical context**
- Institutional performance**
- Trust**



Developmental Stages of Risk Communication (1970s-1990s)

- 1) Get the numbers right**
- 2) Tell people the numbers**
- 3) Explain what the numbers mean**
- 4) Show people they accepted similar risks**
- 5) Show people it's a good deal for them**
- 6) Treat people nicely**
- 7) Make people partners**
- 8) (and if all else fails) All of the above**

Fischhoff, B. 1995 Risk perception and communication unplugged: twenty years of process. *Risk Analysis*, 15, 137-145.



Reasons for Engagement and Dialogue

- Incorporating Public Values in Decisions (e.g. equity)
- Improving Decision Quality
- Resolving Conflict
- Establishing Trust and Legitimacy
- Education and Information (but need genuine two-way engagement)

See: *Nanoscience and Nanotechnologies: Opportunities and Uncertainties* Royal Society / Royal Acad. Eng, 2004, London, Ch 7.



Engaging ‘the Public’ in Policy Decisions: Some Issues

- **Not all expressions of public attitudes carry legitimate or actionable values**
- **The ‘public’ is highly differentiated in terms of social and ethnic background, and in its attitudes to risk issues**
- **A mistake to confuse ‘stakeholders’ with ‘the public’**
- **Need to balance deliberation and access with ‘representation’**



GM comes a cropper as Britain says a huge No

THE public overwhelmingly rejected GM crops yesterday in an embarrassing setback for Tony Blair.

They declared their opposition to genetically modified food by more than four to one.

The more they learned about the issue "the more intense their concerns" became.

The £500,000 state-funded GM Nation debate also revealed a lack of trust in Government fuelled by the war with Iraq.

The independent study involved 600 public meetings, 37,000 feedback forms and 1,200 letters and e-mails. Seventy-nine per cent



of those who took part were "implacably" or "some-what" opposed to GM.

A separate control group of 77, many of whom were initially less hostile to possible benefits of GM, now say not enough is known about the long-term health effects.

Environment Secretary Margaret Beckett promised to "listen" to the findings, which follow a Cabinet

Office study this summer which said GM crops do not offer a clear economic benefit to farmers.

And a Government science review gave the technology lukewarm support.

However, the public debate has been completed before the results of farm-scale trials of GM crops are released.

Leaked documents suggest the Government has decided to agree to the commercial cultivation of GM crops in the UK.

Mr Blair and science minister Lord Sainsbury are openly in favour.

The chairman of the GM Nation debate, Professor

Malcolm Grant, dismissed biotech industry claims that it was unrepresentative.

And Friends of the Earth's GM campaigner Pete Riley said: "The Government will ignore this report at its peril."

"The public has made it clear that it doesn't want GM food and it doesn't want GM crops."

"There must not be any more weasel words from the Government on this issue."

Greenpeace issued a statement declaring: "What part of 'No to GM' don't you understand, Mr Blair?"

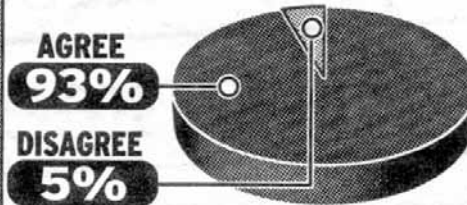
Activists pledged to uproot any commercial GM crops which are planted.

Source: *Daily Express*, 25th September 2003

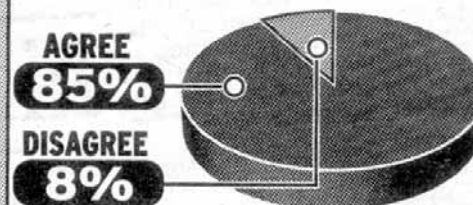


GM: THE NATION'S VERDICT

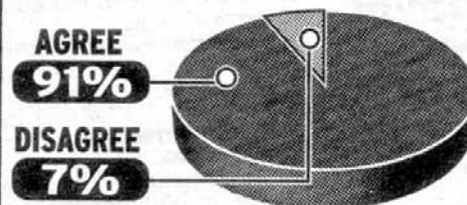
1 Not enough is known about long-term health effects of GM foods.



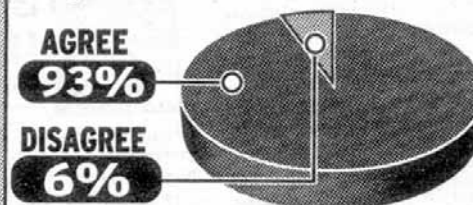
2 GM crops would mainly benefit producers not ordinary people.



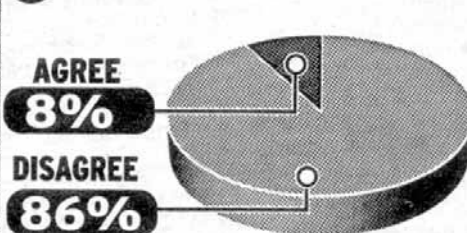
3 There are potential negative effects of GM crops on the environment.



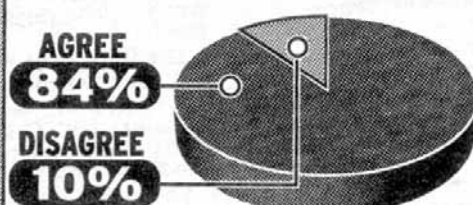
4 GM technology is driven more by profit than the public interest.



5 Happy to eat GM food



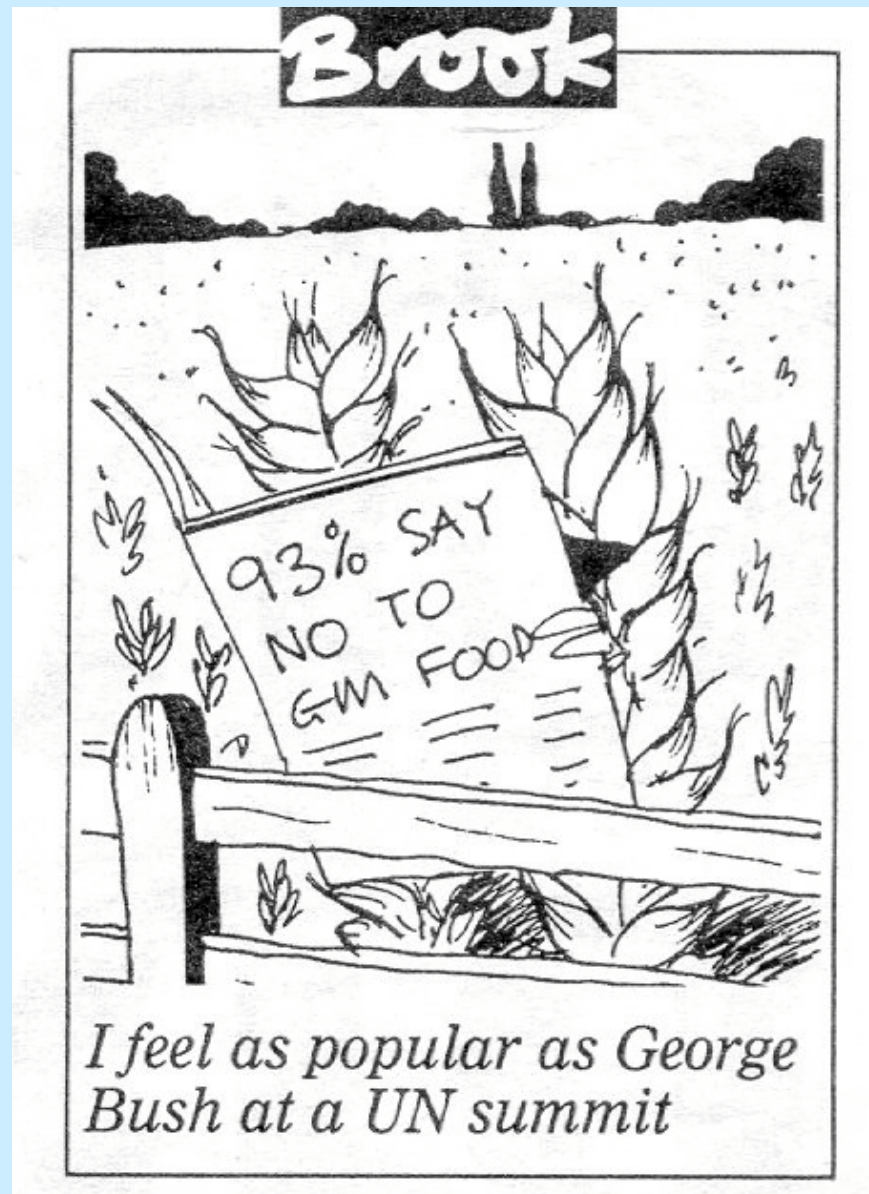
6 GM is an unacceptable interference with nature.



Source: *Daily Mail*

25th September
2003



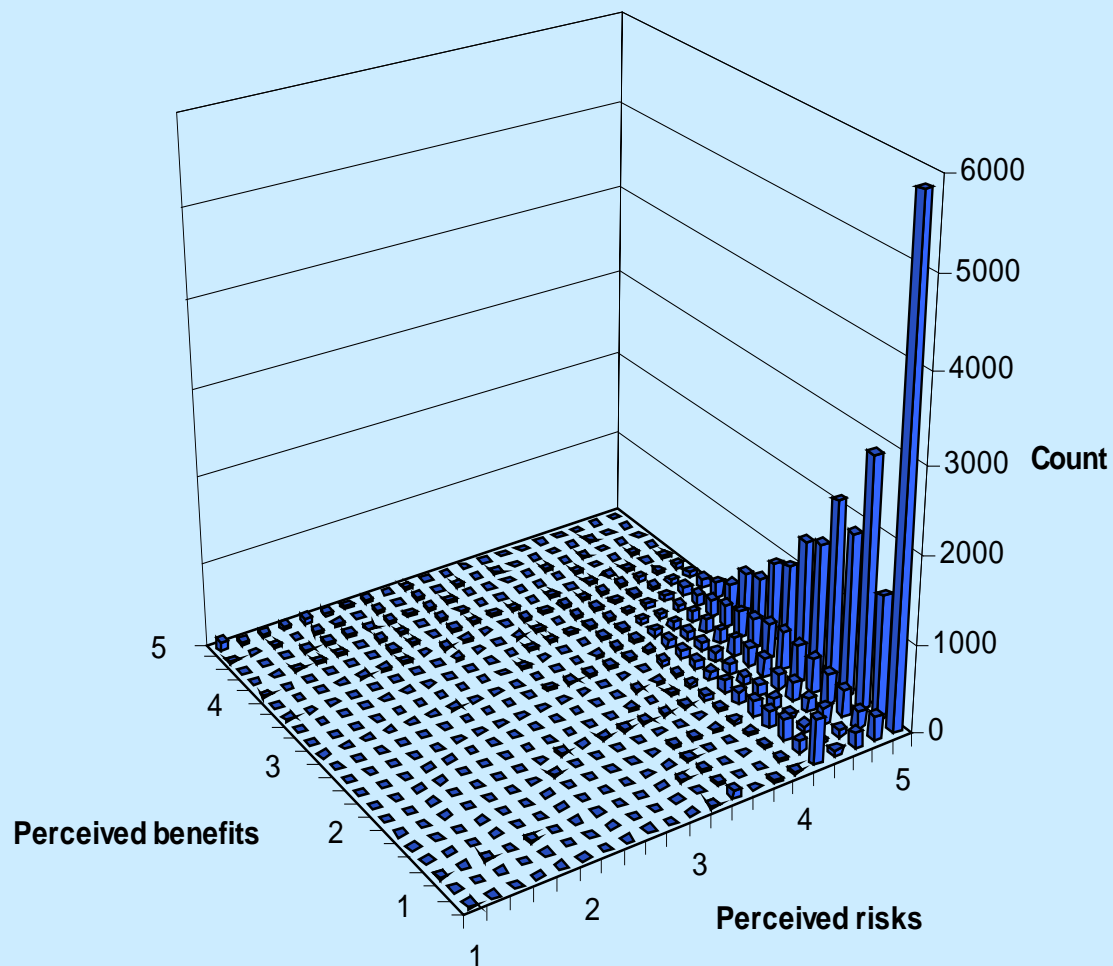


Source: *Evening Standard*,
24th September 2003



Perceived Risks and Benefits of GM Food and Crops

(Open GM Nation? responses [paper and website] n=36,557)



The 2003 UEA/MORI GM Nation? Survey



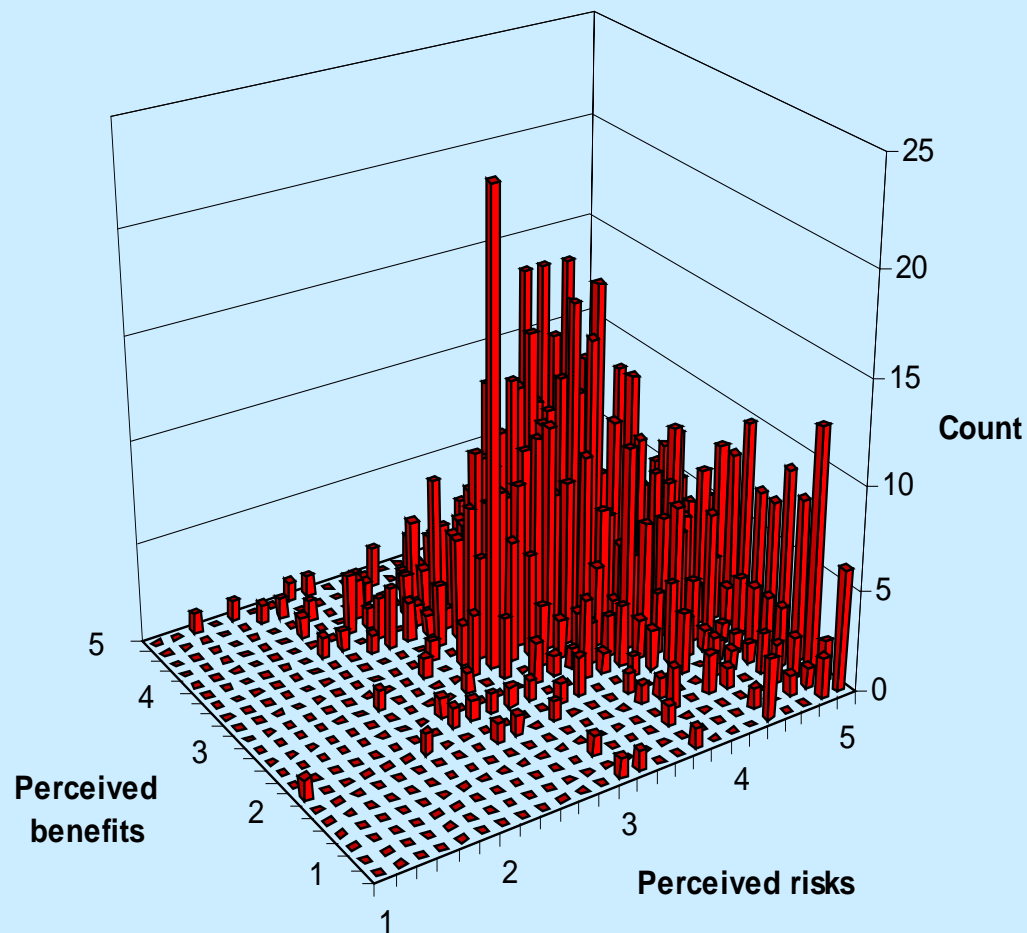
- Data collected during July-September 2003 by MORI
- In Britain (England, Wales, Scotland)
- Quota sampling in 92 sample points
- Total sample: 1,363 respondents
- Weighted to the known profile of Britain

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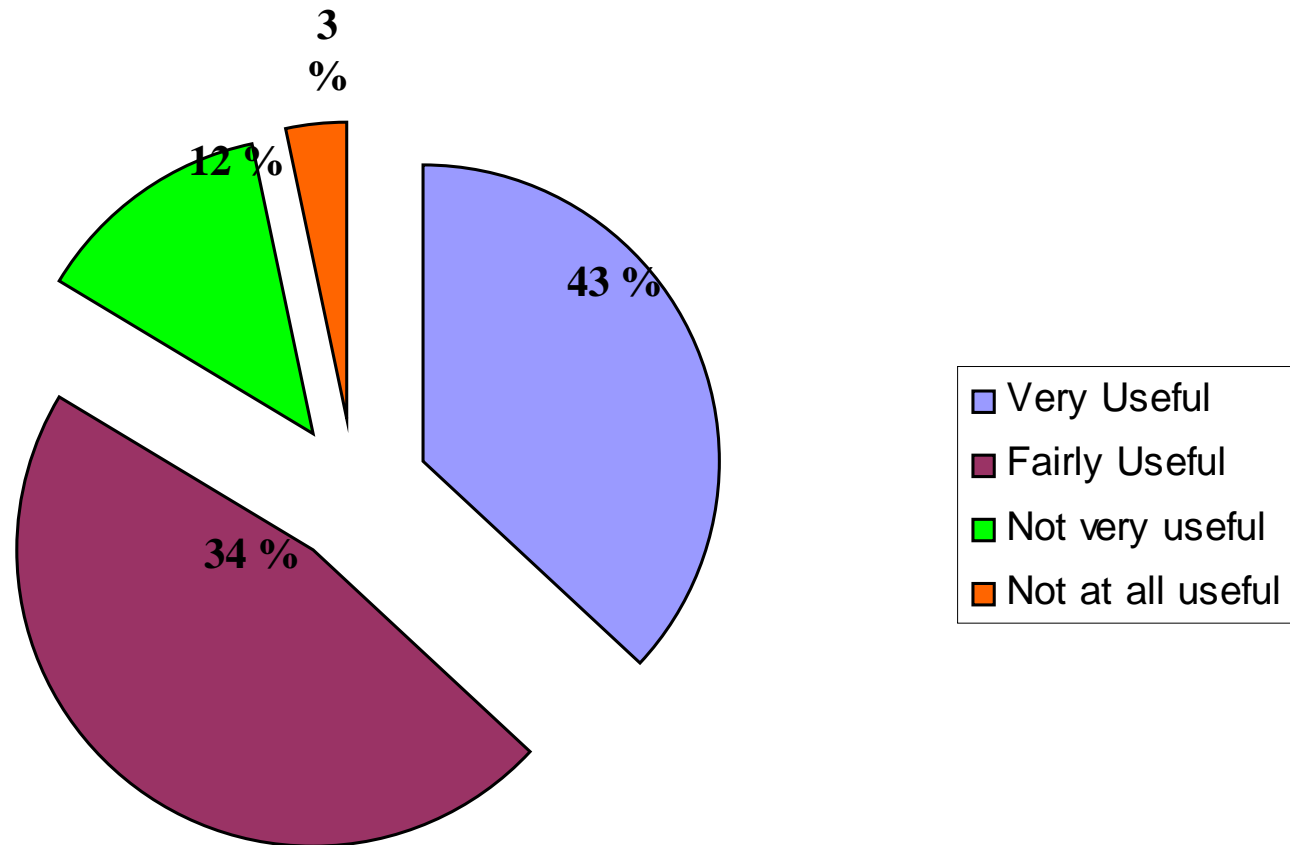


Perceived Risks and Benefits of GM Food and Crops

(UEA/MORI 2003: n=1,363)



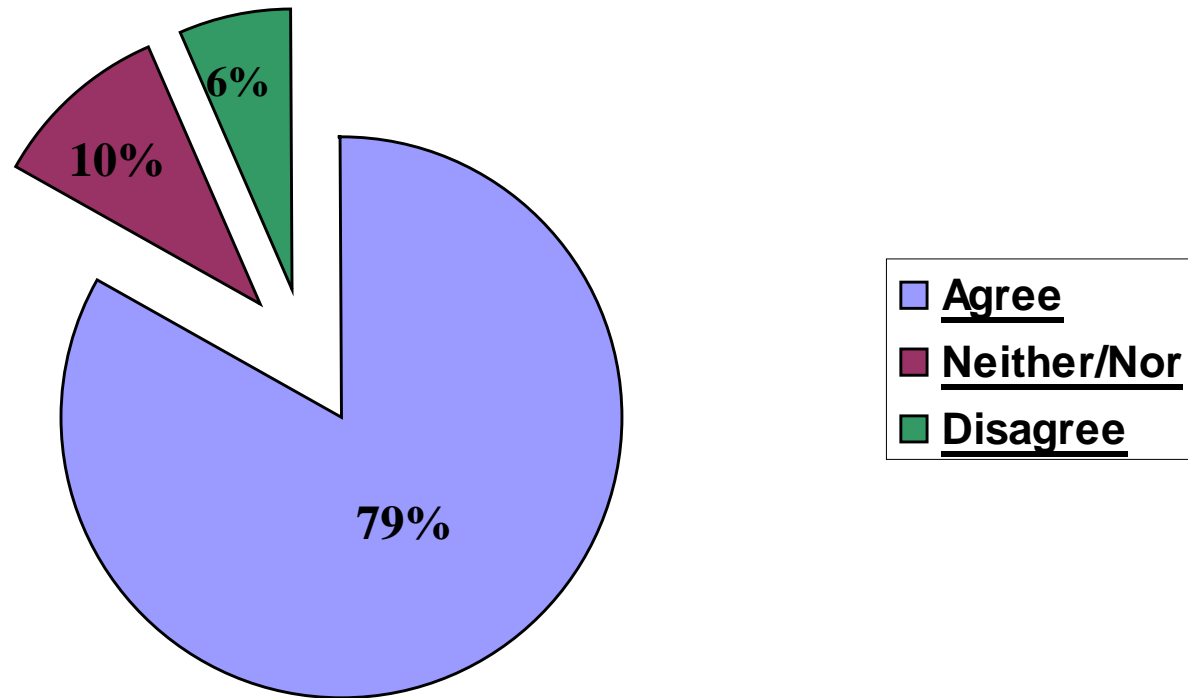
How useful are public debate such as "GM Nation?" for other new developments in Science & Technology?



UEA/MORI GM Survey 2003 (Weighted dataset, n=1,363)



**Organisations separate from government are needed to
regulate GM Food?**



UEA/MORI GM Survey 2003 (Weighted dataset, n=1,363)

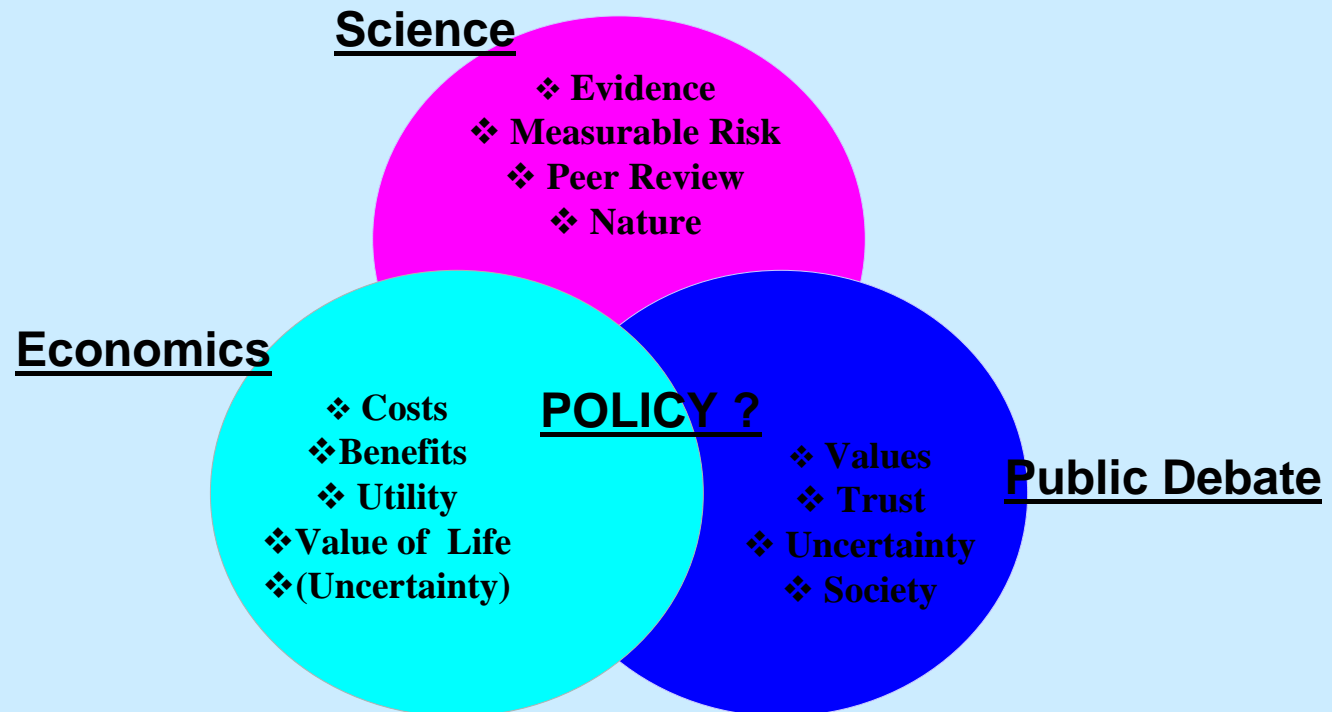


Evidence streams: how should policy makers choose?

- **In the UK there has been a welcome move to sponsor genuine and innovative public engagement processes (e.g. FSA / GM Nation? / CoRWM)**
- **However, how should policy makers weigh evidence streams which have different decision criteria?**



Evidence Streams for Risk Policy: 3 Key Components



Science, Economics and Public Deliberation

- Evidence streams qualitatively different
- Interdependencies exist
- Each implies different criteria for decision (some uncontroversial, some problematic)
- Proper deliberation about what is ‘acceptable risk’ in the public *and* policy spheres requires consideration of all 3

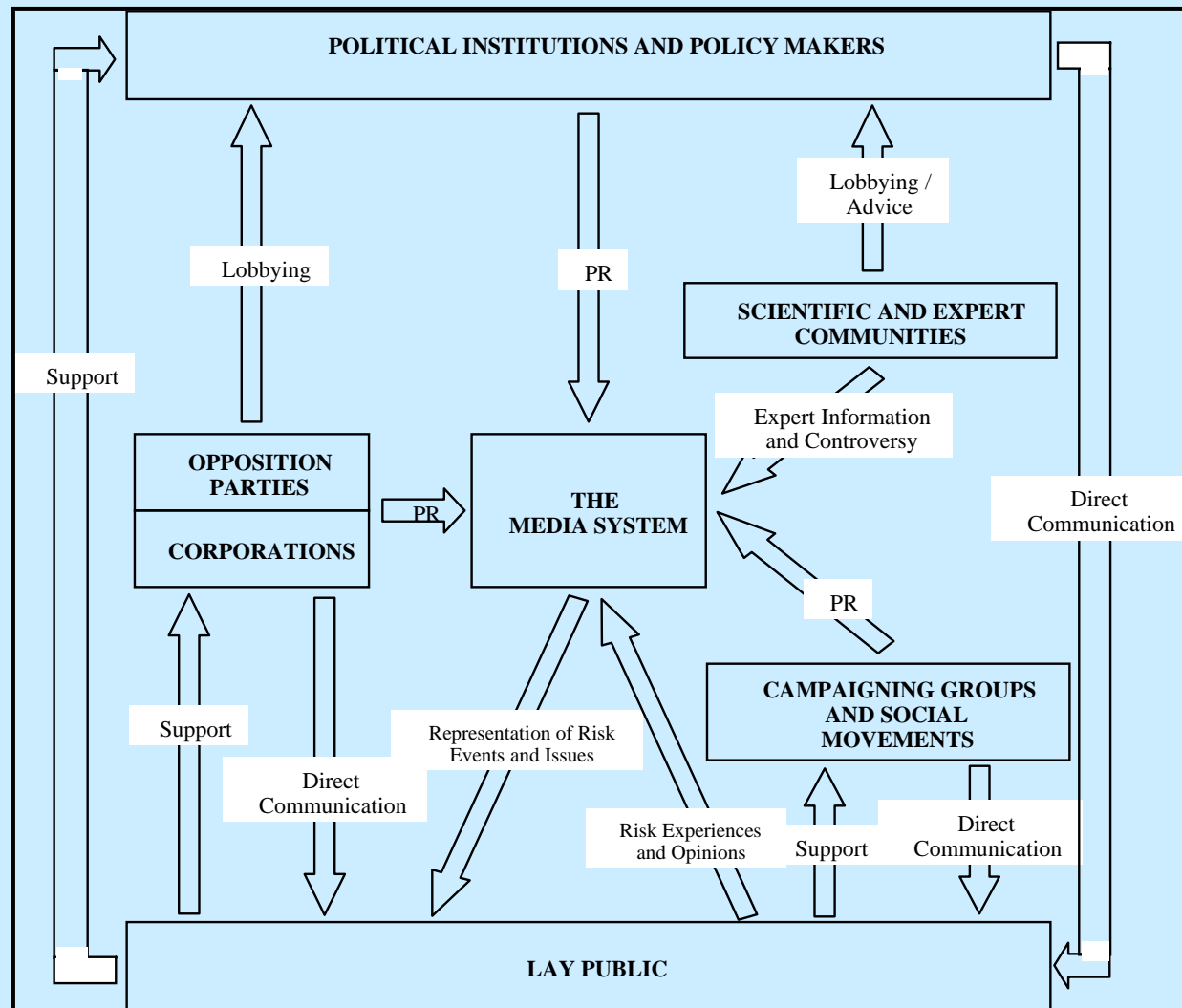


Pressures on the Evidence Streams

- **Media**
- **Politics**
 - **Law**
- **Lobbying**



Source: Murdock et al (2003) 'After amplification: rethinking the role of the media in risk communication' In N. Pidgeon, R.K. Kasperson and P. Slovic (eds) *The Social Amplification of Risk*. Cambridge: CUP



2004 - 'Upstream' Engagement

- Dialogue and deliberation amongst affected parties about a *potentially controversial risk issue* upstream of the Research & Development process and in advance of significant applications or controversy

see: *Nanoscience and Nanotechnologies: Opportunities and Uncertainties* Royal Society / Royal Acad. Eng, 2004, London.

also: *Demos See Through Science*, 2004, London



Royal Society /RAE Survey: Awareness of Nanotechnology

(January 04)

**Heard of and able to provide any definition of nanotechnology
(n=1005)**

19% Yes 81% No (inc Don't Know)

A majority (68%) of the 172 respondents who could offer a definition thought nanotechnology will improve our way of life in the next 20 years as compared to 4% who said it will make things worse?

See: *Nanoscience and Nanotechnologies: Opportunities and Uncertainties* Royal Society / Royal Acad. Eng, 2004, London, pp 59-62.



Royal Society /RAE Qualitative Workshops (December 03)

- Concern over any long-term uncertainties associated with nanotechnology
- Role and behaviour of institutions – who can be trusted to ultimately control and regulate nanotechnology?
- Enthusiasm for the possible ways that nanotechnology would benefit their and others lives
- Ethical concerns over messing with the building blocks of nature

See: *Nanoscience and Nanotechnologies: Opportunities and Uncertainties* Royal Society / Royal Acad. Eng, 2004, London, pp 59-62.



Concluding Comments

- **Good practice in public engagement methodology can and should be built upon (beyond ‘perceptions’)**
- **How science articulates within engagement processes is less clear and vice versa**
- **How do policy makers choose when evidence streams conflict?**
- **‘Upstream’ engagement presents significant challenges**



Programme on Understanding Risk

Public Perceptions, Institutional Change and Stakeholder Participation

www.uea.ac.uk/env/pur



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