



# The Economic Value of Participation for Water Resource Management

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RURAL ECONOMY  
AND LAND USE

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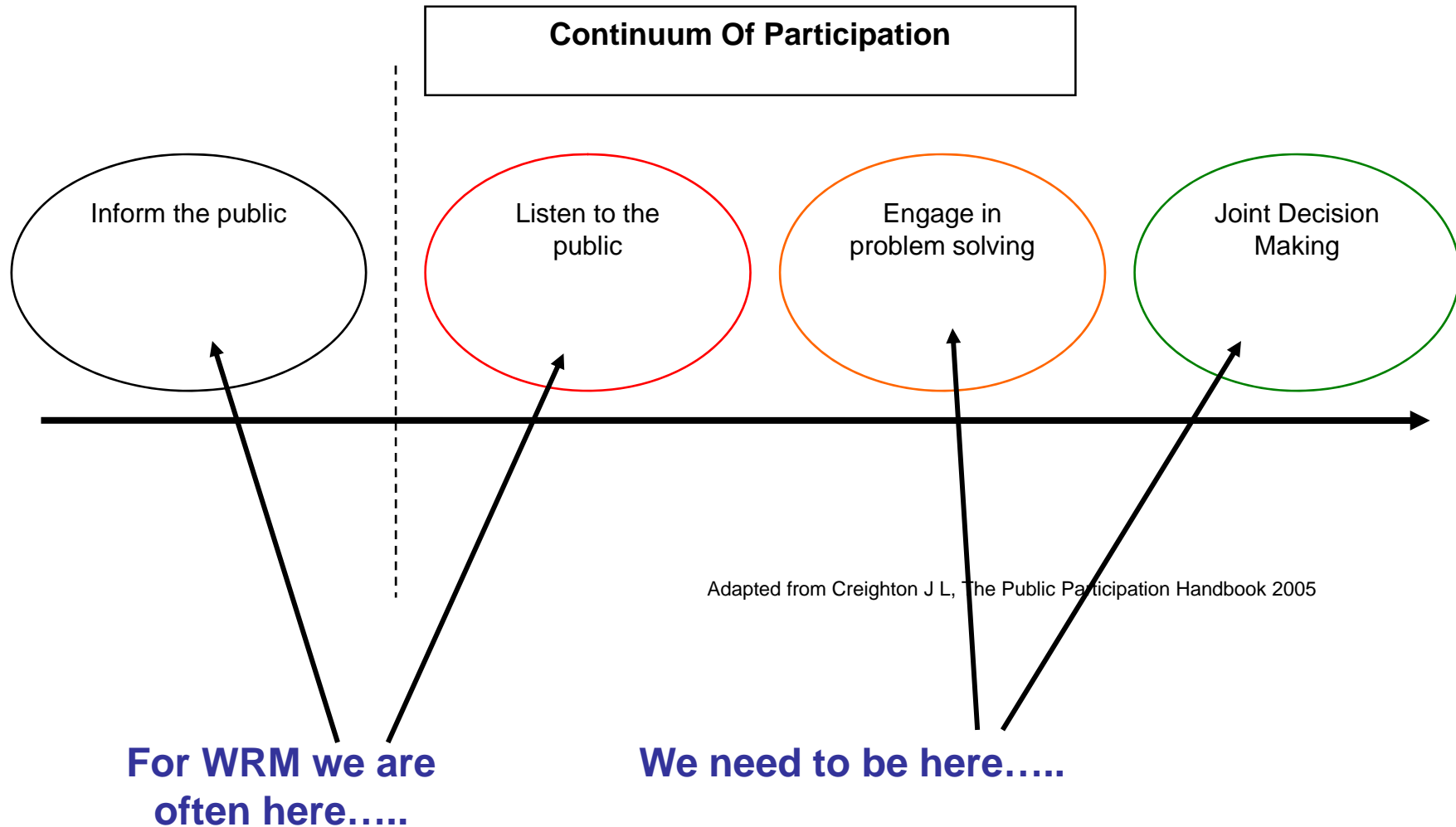
# Outline: key questions

- What is public participation?
- Why is participation relevant to water resource management?
- What are the costs and benefits for society?
- If it works, how does it work?

# What Is Public Participation?

....a process through which decision makers engage with the people who will be affected by decisions and involve them in the decision-making process

# What is public participation?

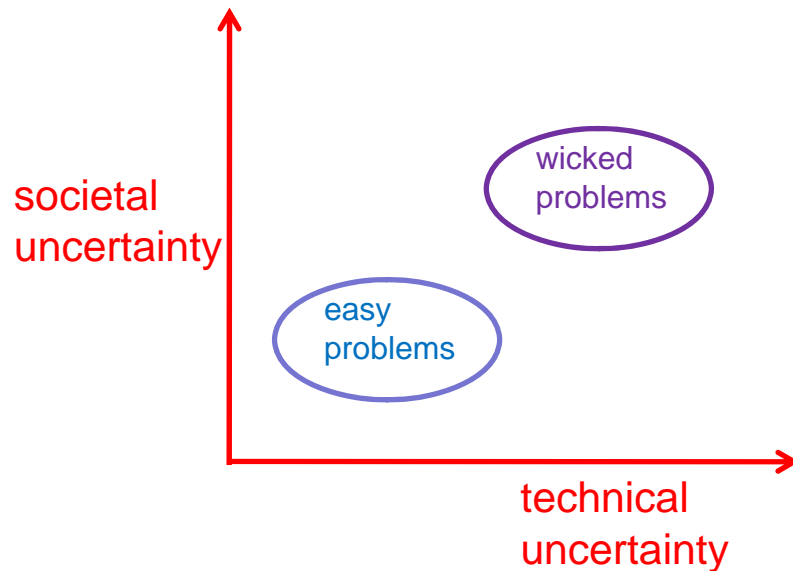


# Why is participation relevant to water resource management?

- Improving water use, quality and flood risk requires **behavioural change** by land and water users, particularly (but not exclusively) farmers – **a broad societal response**
- This must be achieved through the **right mix** of
  - voluntary action by land and water users
  - policy based incentives
  - regulation
  - co-ordinated action by local government, water utilities, regulatory agencies, land users and civil society groups – **beyond the capacity of a single agency**
- Public participation is both a necessary **element of this mix** and a **means to facilitate and improve** the other elements

# How to allocate, manage and protect water resources in catchments in which people live, work and play?

## A 'wicked' problem!



- complex and location specific
- dynamic, uncertain
- diverse legitimate values and interests
- no definitive problem formulation
- many externalities
- multiple trade-offs
- intractable for a single organisation

(Rittel & Webber, 1973) (Ludwig, 2001)

## That needs:

- a “twin-track” adaptive approach of iterative scientific research and public participation and negotiation
- capability for “social learning” – the transformation of the problem through change in collective understanding and practice.

# What are the costs and benefits for society?

**Costs – mainly staff, resources and participant time**

## **Benefits - SIN**

- **Substantive:** better decisions
- **Instrumental:** better implementation
- **Normative:** a better society

# Costs and benefits of participation

Costs	Benefits
<p><b><u>Direct</u></b></p> <p><b>1. For government</b> – staff, fora, information, venues, outreach and education</p> <p><b>2. For participants</b> – own time, expenses, cost sharing in planning and implementation</p>	<p><b><u>Outcome benefits</u></b></p> <p><b>1. Improved information</b> – local and expert knowledge – stakeholder values</p> <p><b>2. Improved decisions</b> – diagnosis, targeting, innovation, feasibility</p> <p><b>3. Improved implementation</b> – “ownership” &amp; compliance, reduced costs (less duplication, waste &amp; monitoring), less litigation, cost effective partnerships and volunteering</p>



Costs	Benefits
<p><b><u>Indirect</u></b></p> <ul style="list-style-type: none"> <li>– lengthier planning and appraisal, airing of dormant conflicts, change in focus and delays</li> </ul>	<p><b><u>Process benefits</u></b></p> <ul style="list-style-type: none"> <li>– reduced bureaucracy, accountability, trust and alliances, citizen awareness and capacity to access &amp; influence public institutions/policy</li> </ul>
<p><b><u>Other costs</u></b></p> <ul style="list-style-type: none"> <li>– loss of control for government (?); stakeholder/participant fatigue</li> </ul>	<p><b><u>Other benefits</u></b></p> <ul style="list-style-type: none"> <li>– democratic legitimacy for institutions, social justice, less centralisation, citizen empowerment, social cohesion and less conflict</li> </ul>

# Example

## Project

### Humber Estuary Designation Project

- 2001-4
- to review and possibly extend the legal protection for wildlife
- previous plans met with hostility and were withdrawn
- participation beyond statutory requirements
- 450 stakeholders, including local landowners

## Costs

Staff, venues, resources etc.

Approx £70,000 pa

Participants' time - varied input: local authorities and professional stakeholder put in most time. One stakeholder reported putting in 100 - 200 days over the period.

## Benefits

- completion of the designation
- greater public awareness
- reduced conflict
- positive press coverage
- new groups and partnerships
- credibility for participant organisations
- easier work in future
- time and cost savings in future because of increased trust
- saved legal costs

## A partial budget for participation

<p><b><u>New costs</u></b></p> <p>Resource costs _____</p> <p>Capacity _____</p> <p>    building _____</p> <p>Participant's _____</p> <p>    costs _____</p> <p>Sub-total: _____</p>		<p><b><u>Costs saved</u></b></p> <p>Implementation _____</p> <p>Monitoring &amp; _____</p> <p>    enforcement _____</p> <p>Litigation avoided _____</p> <p>Sub-total: _____</p>	
<p><b><u>Benefits foregone</u></b></p> <p>Nil (?) _____</p> <p>Sub-total: _____</p>		<p><b><u>New benefits</u></b></p> <p>Improved _____</p> <p>    outcomes &amp; _____</p> <p>    process _____</p> <p>    (value?) _____</p> <p>Sub-total: _____</p>	
<p><b><u>Total:</u></b></p>	<p><b>X</b></p>	<p><b><u>Total:</u></b></p>	<p><b>Y</b></p>

## Example

<u>New costs</u>		<u>Cost saving needed to break even</u>	
<ul style="list-style-type: none"> <li>Resource costs of river basin commissions and catchment forums</li> </ul>	2.2	<ul style="list-style-type: none"> <li>0.5 % of predicted WFD implementation costs of £451m per year (from DEFRA, 2003)</li> </ul>	2.25
<b><u>Total:</u></b>	<b>2.2</b>	<b><u>Total:</u></b>	<b>2.25</b>

Millions of pounds per annum  
 Le Quesne and Green, 2005.

DEFRA and the Environment Agency (2005) estimated that around 5% of all permit applications required 500+ hours work to process and 1% required 1,000+ hours.

# A pragmatic analysis is needed:

- focus on the most significant costs and benefits  
(is a cost-savings analysis sufficient?)
- compare to the alternative  
(the without or less participatory scenario)
- accompany cost and benefit estimates with a narrative that identifies intangible benefits
- the distribution of costs and benefits is also very important

# How does participation work?

IRC/IAD/TCE	SCF	ACF and ADR
<ul style="list-style-type: none"> <li>• Institutional Rational Choice</li> <li>• Institutional Analysis and Design</li> <li>• Transaction Cost Economics</li> </ul>	<ul style="list-style-type: none"> <li>• Social Capital Framework</li> </ul>	<ul style="list-style-type: none"> <li>• Advocacy Coalition Framework</li> <li>• Alternative Dispute Resolution</li> </ul>
<p>participate and collaborate if: benefits &gt; costs s.t. resources available and bounded rationality</p>	<p>'virtuous circle' of <i>trust-reciprocity-networks</i> fosters collaboration and the level of voluntary cooperation/action</p>	<p>advocacy coalitions share normative beliefs and perceptions, and collaborate for common objectives</p>
<p>transactions costs are key</p>	<p>norm-driven behaviour and trust can reduce transaction costs</p>	<p>degree of 'belief conflict' is key</p>
<p>institutional rules are basis for <b>trust</b>, reducing transactions costs, sharing information and reducing risk</p>	<p><b>trust</b> is a social norm that can substitute for more formal rules and contracts etc.</p>	<p><b>trust</b> can be difficult to achieve, but facilitated processes of conflict resolution can work</p>

# *Conclusions*

- a strong ‘a priori’ case for participation with some theoretical support
- can identify potential costs and benefits
- many examples of success
- some qualitative evaluations
- very few quantitative/costed evaluations/CBAs
- we can and should attempt more
- a combination of frameworks/theory helps to explain how participation works
- we can share lessons on how to do participation well



# Thank you for listening

For more information: [l.smith@soas.ac.uk](mailto:l.smith@soas.ac.uk) and <http://www.watervgov.org/>



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