



### **Economics Briefing 2**

# How economics is used in government decision making

The UK Treasury specifies that "all new policies, programmes and projects should be subject to comprehensive assessment". There are a range of different approaches (economic and otherwise) that governments take towards this, but one economic tool in particular – cost–benefit analysis (CBA) – has come to occupy centre stage.

This briefing looks at how economics is used in decision making and the problems with this, both in theory and in practice.

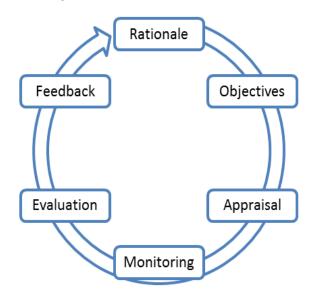
## How is economics currently used in decision making?

The diagram on the right shows the cycle of activities generally involved in government policy making<sup>1</sup>. Let's start by looking at where economics fits into this process.

#### Rationale

Accountable governments must give reasons for doing things. As outlined in the previous briefing, the two main government justifications given for intervention in a capitalist economy are:

- 1 To address market failures in order to promote efficiency
- 2 To distribute wealth (or equity) more evenly



As an important note regarding 1: there are a number of problems with relying on this approach in practice, as market failures (e.g. the 2008 banking crisis or climate change) have become so endemic that it is now the norm rather than the exception – therefore, it

<sup>&</sup>lt;sup>1</sup> The cycle we show is used in both the Green Book (guidance that should be used for appraising any government spending) and the Magenta Book (guidance on evaluating money already spent) <a href="http://www.hm-treasury.gov.uk/d/magenta">http://www.hm-treasury.gov.uk/d/magenta</a> book combined.pdf

is questionable whether it is a useful concept as currently practiced<sup>2</sup>.

### Appraisal

Once a government has decided to take action, and has established its key objectives in doing so, it should carry out a careful appraisal of its options for meeting these objectives.

A good appraisal should question the following:

 How will each option change things, by how much and for how long?

Let's say, for instance that – in order to conserve seabed habitats – a particular type of fishing gear was to be banned from a certain area. Before introducing such regulation, a government would want to understand how firms and people might respond to this change, including how they might distort their behaviour in order to get around or avoid the regulation. In doing so, it would need to take risk and uncertainty about the future into account.

There are a range of tools that economists use to make these sorts of predictions including modelling (known as microsimulation), looking at demand schedules, forecasting, and examining data from similar changes across different times and space.

What is the value of each option?

This is the part that often gets the most attention and is what usually comes to mind when people think of economic analysis.

A common approach to valuing policy options is cost—benefit analysis (CBA). This basically involves putting a financial value on all of the costs and benefits of an intervention, and weighing them up. It should take into account not just those costs and benefits that have a actual market value, but also the action's wider social and environmental outcomes that do not.

In reality, the type of appraisal that holds the most sway is the regulatory impact assessment (RIA), which has been a key tool in helping 'improve' the quality of regulation and 'reduce unnecessary burdens' on business.

#### **Evaluation**

This has some similarities with the appraisal phase except that it happens during and at the end of a project, rather than before. Economic evaluations generally focus on the counterfactual – or, put simply, what would have happened had the action not been taken.

Working this out is usually very difficult. Changes happen for complicated reasons, making it hard to pinpoint the effects of individual policies or procedures. Nevertheless, a range of complex econometric tools, with technical names like 'regression', 'difference in difference', and 'instrumental variables' have been developed to help unpick the causes of change. The 'experimental approach' towards carrying out projects and policies is also becoming more common (see The Cabinet Office's recent paper<sup>3</sup> for more information). Whilst laudable in theory, it is hard to find evaluations of government projects that have used this approach successfully.

<sup>3</sup> Paper available at:

http://webarchive.nationalarchives.gov.uk/+/http://www.c abinetoffice.gov.uk/~/media/assets/www.cabinetoffice.gov .uk/third sector/assessing impact se full%20pdf.ashx

<sup>&</sup>lt;sup>2</sup> <a href="http://www.nesta.org.uk/library/documents/failure-of-market-failure.pdf">http://www.nesta.org.uk/library/documents/failure-of-market-failure.pdf</a>

### What are the problems with relying on an economics approach to decision-making?

As we have seen, economics enters several stages of the decision-making process. In practise, however, the appraisal stage is where it really makes waves – usually in the guise of economic cost–benefit analysis.

Whilst it may seem sensible to count the costs and benefits of a course of action, there are a range of problems to consider:

- 1 Problems with price: UK Treasury guidance states that CBAs should take account of wider social and environmental outcomes. Unfortunately, many CBAs are terrible at doing this in reality. Even when they do, the very process of converting everything to one metric (i.e. monetary price) throws up various ethical questions and mixes up renewable and non-renewable resources. (See briefing 3 on valuing the environment.)
- 2 Failure to consider equity: Whilst the Green Book (guidance that should be used for appraising any government spending) states that appraisers must 'identify how the costs and benefits accrue to different groups', this is often not done in reality. If it *is* done, the results are rarely considered in the final decision.
- 3 Biased technical discussion about costs:
  Some costs, such as the cost of regulation, are perennially over-estimated while others are under-estimated. The miscalculation of costs is not always caused by human error, but is often the result of lobbying by analysts with vested interests in certain outcomes. As Ackerman shows, the nature of such discussion is often secretive, and can

- serve to disenfranchise the public from participating in important political debates<sup>4</sup>
- Risk and uncertainty: Particular difficulties with predictions or assessment apply to projects where there is risk or uncertainty. Valavanis describes economic statistical tools like an 'exquisitely balanced French recipe' which sets out in detail methods to use for preparation. The problem arises because the right ingredients are not available and prestige in the profession rests on technical expertise rather than on the hard work required to collect data about the world that is useful. <sup>5</sup> The point here is that analysts often spend a lot of time calculating minute details, but have such little information about the important parts of their work that it is of questionable

The economic approach used in decisionmaking does not adequately cover environmental tipping points (large nonlinear irreversible change e.g. the melting of the Greenland ice sheet or shifting of the north Atlantic conveyor).

- Decisions presented as being objective, when really they are subjective. Numbers often give the impression of being factual and objective, but in reality models are made up of assumptions and subjective decisions. For example, it is a subjective decision to set the UK discount rate (the rate at which we 'mark down' the value of future costs and benefits see briefing 5) at 3.5%.
- 6 Lack of democracy: Although economic appraisals are supposed to consider the course of action that is best for the jurisdiction in question, in reality the

<sup>&</sup>lt;sup>4</sup> Ackerman, F (2008) Critique of Cost-Benefit Analysis, and Alternative Approaches to Decision-Making - A report to Friends of the Earth England, Wales and Northern Ireland

Valavanis, S (1959) Econometrics. New York: McGraw-Hill cited in Kennedy, P (2003) A Guide to Econometrics, Blackwell Publishing.

groups that have a larger voice, such as those who are actually completing or commissioning the analysis, often have a bigger say. We go onto this in more detail below.

## How is economics really used in decision making?

In reality economics is rarely used in decision making in the way the HM Treasury guidance recommends. It is impossible to disentangle politics from decision making for a variety of reasons – some of which are clearly unavoidable if decisions need to be taken fast, or if voters challenge an unpopular decision.

In other cases, economic models are susceptible to being manipulated by vested interests. They can be commissioned with the set purpose to justify a decision that has already been made, rather than a genuine appraisal of the options. A politician or lobby may have a favoured policy or project and then commission economic analysis as little more than publicity to back up their case. (The recent <a href="HS2 rail proposal">HS2 rail proposal</a> is a good example of a foregone conclusion being justified retrospectively.)

Even when a decision hasn't already been made, there are often systematic biases which mean some stakeholders are given more weight than others in economic analysis. As the environment and future generations aren't able to attend consultation events, and don't sit in anyone's constituency, they are often not counted in decision making.

### Summary: getting behind the model

We've seen there are some serious problems with using economic approaches, both in theory and practice. This isn't improved by inaccessible language and the methodology tucked away in technical appendices. For this

reason it is often difficult for non-economists and the public to engage in debates and to identify misguided economic arguments.

### **Challenging the analysis**

We hope these briefings will equip you to be able to identify weak rationale and challenge bad decision making.

### A few hints or questions to ask:

- Who wrote the report and conducted the analysis, and why? Be particularly wary of reports commissioned by lobby groups, or even commissioned by government, if it looks like a decision has already been made and only one option is being appraised.
- Don't be put off by lots of spreadsheets and technical appendices. Just because a report has lots of numbers and lots of valuations doesn't mean it's any good. Question its authors on whether they have any evidence or data from the real world, how they have assessed risk and uncertainty, and how they have assessed what would happen without the change.
- Look in detail at what costs and what benefits have been given a value and more specifically who (in terms of groups of people now, as well as the environment and future generations) is included.

### Further reading and useful resources

<u>The Green Book:</u> The Green Book sets out a framework for the appraisal and evaluation of all policies, programmes and projects.

The Magenta Book: The Magenta Book builds on themes in the Green Book with more detailed guidance on evaluation. It's recommended for use by all policy makers, including in local government, charities and the voluntary sectors

The Marine Socio–Economics Project (MSEP) is a project funded by The Tubney Charitable Trust and coordinated by nef in partnership with the WWF, MCS, RSPB and The Wildlife Trusts.

The project aims to build socio-economic capacity and cooperation between NGOs and aid their engagement with all sectors using the marine environment.