Efforts towards marine conservation and sustainable fishing must be made on a number of fronts: political, social, economic and environmental. NGOs typically engage in environmental debate, but many of the decisions made by policy makers and marine users are based primarily on socio-economic considerations.

It is increasingly crucial that marine charities and other non-governmental organisations (NGOs) can confidently engage in economic argument to support the sustainable change they campaign for. Since 2012, the Marine Socio-Economics Project (MSEP) has worked to improve access and understanding of economic issues for NGO staff.

There were two overarching goals for the project:

- to build economic literacy and capacity within NGOs;
- to facilitate more effective collaboration between NGOs.

A study by IMM Ltd for the Tubney Charitable Trust highlighted that a greater awareness of the social and economic issues surrounding the use of the sea would help NGOs campaign more effectively for marine conservation and widen their understanding of the socio-economic impacts of their campaign demands.

Working with four key UK NGOs involved in the fisheries-marine biodiversity debate, (MCS, RSPB, the Wildlife Trusts and WWF) the project has highlighted how economic arguments can be used to engage in debates around the socio-economic value of different marine sectors, and to question government or industry analysis in a robust, credible manner.

To influence long-lasting sustainable change in how marine resources are managed, this work must continue. We’ve produced this collection of resources as a reference pack for new starters and staff who may be new to the economic concepts and language that underpin many of the socio-economic issues. It’s also for anyone with an interest in socio-economics, the marine environment, or both.

**Learning and challenging economics**

There are significant problems with the economic approaches used in decision making, both in theory and practice. These are worsened by inaccessible language and often-hidden
methodologies and assumptions – 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.

We sought to demystify economics through a series of accessible briefings that challenge readers to think critically about economics and to appreciate economics is neither value neutral, nor scientific. Starting with the fundamentals of economic theory, and illustrating how theory shapes practice, we posed a series of basic questions, including:

- What is an economy for? How do markets work?
- What economic tools are used to make decisions?
- What are the key economic indicators of progress? Are they guiding us in the right direction?
- What is the role of banks in the economy?
- How do economists view human behaviour?

We put these wide-reaching economic questions into a marine context using case studies to support each briefing. Some of the fundamental flaws in the prevailing economic theory are exposed when we look at the real world. These real-world facts, which counter mainstream economic theory, include the following:

- the presence of imperfect or asymmetric information;
- wide ranging and pervasive market failures such as climate change or overfishing;
- the positive environmental and social contribution of regulation, where the government “intervenes” in the market;
- power asymmetry, which frequently determines outcomes but is not acknowledged;
- the limited rationality of people.

The final two points are widely neglected in mainstream economic theory, while others are not dealt with by using our current policy prescriptions, set by BIZ and HMT.

We produced the following resources as part of the MSEP project.

1. ‘Economics in policy making’ briefings

These briefings deal with key economic concepts, their application to public policy and identify the major flaws in some of the associated mainstream economic thinking. The briefings include marine-related case studies to show the real life application of these economic approaches. The briefings are arranged by sector and cover the following topics:

**Economics in policy making briefings**

- Briefing 1: An overview of economics
- Briefing 2: How economics is used in government decision-making
- Briefing 3: Valuing the environment in economic terms
- Briefing 4: Social cost-benefit analysis and social return on investment
- Briefing 5: Discounting and time preferences
- Briefing 6: Multi-criteria analysis
- Briefing 7: Beyond GDP: Valuing what matters and measuring natural capital
- Briefing 8: Markets, market failure and regulation
• Briefing 9a: Finance and money: the basics
• Briefing 9b: What’s wrong with our financial system?
• Briefing 10: Property rights and ownership models
• Briefing 11: Behavioural economics – dispelling the myths

2. Facts and figures briefings

These briefings are snapshots of the key statistics, trends and information from across the marine environment. They put the economic concepts from the first set of briefings into a marine context, and encourage project participants to replicate this approach in the future. To ensure the statistics remain up to date, we have included links to the main data sources used to conduct the research and analysis.

The briefings are arranged by sector and cover the following topics:

• **Capture fisheries**: UK Fisheries Overview; EU TACs and Quota; What are Producer Organisations; UK Quota ownership; Fishing limits and relative stability; Fleet structure and economic performance; UK landings; UK Regional Breakdown; Fishing and UK GDP; Fishing capacity and effort.

• **UK marine infrastructure**: Marine Aggregates; UK Ports; UK Shipping

• **Marine energy**: Offshore wind; Oil and Gas; Offshore energy overview; Algal biomass; Wave and tidal.

• **Marine recreation**: Recreational Sea Angling; Angling Minimum Landing Sizes; Recreational Diving.

• **Flows & aquaculture**: Fisheries flows introduction; Imports and aquaculture; EU and UK aquaculture; Subsidies to UK aquaculture; Sustainability and aquaculture; Supply chains and processing; What are the major trends in aquaculture; How much seafood do we consume in the UK; What fish do we eat in the UK and where do we eat it.

3. Wider data sources

The resource pack also includes a summary of the key sources of relevant information for economic analysis; including trade and tax data.

4. Marine Socio-Economics Project workshops

The MSEP project ran a number of workshops between 2012 and 2015, listed below. The presentations and write-ups from these workshops are available on the project website – [www.mseproject.net](http://www.mseproject.net) – and via the links provided below.

• **Impact Assessment** workshop series on the Marine Strategy Framework Directive (MSFD) and Marine Conservation Zones (MCZs) (June and September 2012)

These workshops presented the theory and practise of using Cost-Benefit Analysis for Impact Assessment. This was explained using two major marine policy drivers: the EU MSFD and the UK MCZ process.
• **Infographic Impact Assessment for Marine Conservation Zones** (2015)
  Following these workshops, we produced an Infographic Impact Assessment for MCZs. This included a summary of all 23 MCZs as well as four site specific versions as an example of how ‘best available evidence’ can be presented in a way which incorporates the wider benefits in a more visual way.

• **Theory of Change** (June 2013)
  Theory of Change defines the building blocks that are required to bring about a long-term goal. We used this approach to examine the major marine drivers (CFP, MSFD, MPAs and Aquaculture), and to look at the barriers and opportunities for collaborative projects and strategic areas of work.

• **Valuation** (December, 2013)
  Focused on economic tools, techniques and the critical analysis of flawed economic arguments.

• **Re-aligning nature & progress** (July 2014)
  We brought together over 20 organisations at the WWFs UK headquarters to discuss the major issues surrounding GDP growth, deregulation and how ecosystem services are used to frame nature. Presentations from the seminar are available on the [NEF slide share page](#).

• **European Maritime and Fisheries Fund** (November, 2014)
  We brought together NGOs, Defra, IFCAs, Fishermen and aquaculturists to look at opportunities within the new European fund. Workshop notes and presentations are available here.

### 5. Additional online information

• General project resources are available on the project website – [www.mseproject.net](http://www.mseproject.net)

• Facts and figures – a series of PowerPoint presentations with graphs are available here:
  - [http://www.slideshare.net/nefcomms/capture-fisheries](http://www.slideshare.net/nefcomms/capture-fisheries)
  - [http://www.slideshare.net/aggregates-shipping-and-ports](http://www.slideshare.net/aggregates-shipping-and-ports)
  - [http://www.slideshare.net/energy](http://www.slideshare.net/energy)
  - [http://www.slideshare.net/aquaculture](http://www.slideshare.net/aquaculture)