



Royal Academy
of Engineering



Learn more and book:
Policy Fellowships
Programmes



Learn more and book:
Systems Approaches in
Government Programmes

Policy Fellowships and **Systems Approaches**
in **Government** Programmes

Engineering better policy



Think like an engineer. Make meaningful change.

Civil servants tackle major challenges to deliver change for society.

These challenges are often complex, with wide-reaching and long-term impacts.
Thinking like an engineer can help policymakers design solutions that truly deliver for the public.
Adopting a systems thinking mindset can lead to better outcomes for society.

What is systems thinking?

Systems thinking makes complexity manageable.
Engineers need to understand and manage complexity – it’s their business. They use systems thinking to visualise complexity, identify the most appropriate challenges, design for key stakeholders and interdependencies, and anticipate risks – challenges policymakers also face every day.
With our programmes for teams and individuals, policymakers can learn systems thinking from engineers, enabling them to approach their problems with clarity and make meaningful change.



“The greatest challenge in policymaking today is not just having the right expertise but knowing where to find it and how to apply it effectively. By embedding systems thinking and engineering-led problem-solving into policymaking, programmes like this can help ensure that public policy is not just well-intended but well-executed.”

Sir Chris Wormald KCB
Cabinet Secretary
and Head of the Civil
Service

Policymakers have made big changes after completing our programmes

Our programmes empower policymakers by helping them achieve results on their specific challenges, connecting them with supportive networks of expert engineers, and providing a safe space for experimentation.

- Policymakers taking part in our programmes have gone on to achieve goals including:
- transforming 7.2 hectares of disused land in London.
 - designing responses to reduce the risk of harm to vulnerable children.
 - developing an evidence base to support strategies for decarbonising the UK transport sector.

We offer two programmes for policymakers looking to develop their engineering and systems thinking: the **Policy Fellowships programme**, for individuals, and the **Systems Approaches in Government programme**, for teams.



Policy Fellowships Programme

Intensive programmes helping policymakers
reframe complex challenges

Our **Policy Fellowship programme** is designed for individual policymakers looking to design a resilient solution to a specific policy problem.

As a Policy Fellow, you'll:

- **Acquire new knowledge:** You'll work with leading engineers and field experts to develop innovative, robust solutions to your policy problem.
- **Expand your network:** You'll become part of an active community of Policy Fellows, with whom you can collaborate or share ideas.
- **Get ongoing support:** You'll also get access to a unique network of experienced policymakers, leading engineers and other experts who will support you in reaching your goals.

"This kind of dedicated, focused time with leading experts to sit down and talk about a problem that I'm working on... I can't imagine I can get this anywhere else."

Manu Ravishankar
Innovation Lead, Ofgem Strategic Innovation Fund

"If I mention that I'm part of the Policy Fellowship, I think it makes me more accessible to civil servants within government. Having the alumni aspect of the fellowship I think is really beneficial to increase my network with different Policy Fellows."

Elle Butterworth
Energy Policy Advisor, Energy Systems Catapult:

Who should apply?

We welcome applications from UK-based civil or public servants who:

- want to make an impact on UK public policy in their field.
- are from a range of backgrounds, including economics, politics, sociology, health, planning, digital, science or engineering.
- have a well-defined policy challenge or issue.

Get in touch

To read case studies, explore programme features and apply/book:



For more information, please visit:
raeng.org.uk/support-for-policymakers
or contact **policyfellowships@raeng.org.uk**

"The Policy Fellowship programme has been the defining point in my career... I would definitely recommend the Policy Fellowship widely."

Nicola Coppen
Infrastructure Specialist,
Ministry of Justice UK

System Approaches in Government

Building systems capabilities in policy teams reframe complex challenges

Our **Systems Approaches in Government** programme is designed for teams who are ready to learn the ropes of systems thinking through practical workshops and coaching.

You'll work closely with Academy Fellows and systems experts to build your team's systems thinking capability by exploring policy challenges.

This isn't about us telling you what steps to take – we're equipping you with the confidence and practical tools you need to understand policy problems and create robust policies for change going forward.

We offer three approaches:

- **Systems 101 workshops:** Introductions to engineering systems approaches and how they can support policymakers.
- **Bespoke workshops:** Sessions where you'll learn how to design a systems workshop and apply the right systems tools to solve a live policy problem.
- **Coaching:** 1:1 or group coaching sessions for those looking to develop their systems and critical thinking skills for better decision-making.

"Aspects like stakeholder mapping, boundary setting, etc have been directly used in other pieces of work and I've been able to lead sessions pulling together views from a variety of participants much more confidently."

David Britzman
Risk and Research Lead, Department
of Science Innovation and
Technology

Who should book?

- **Policy teams** looking for engineering systems support in tackling a complex challenge.
- **Leaders** looking for ways to communicate and showcase the benefits of systems thinking in devolved, local and central government and public sector organisations.
- **Policymakers** who want to hit the ground running – workshop participants immediately put the principles of systems learning into practice, so they're working on their challenges from the outset.

The Academy's design and facilitation of the workshops was of the highest quality, enabling a very insightful discussion between policy officials and experts outside of government."

Robert Scott
Heat Strategy Unit,
Scottish Government

Get in touch

To read case studies, explore programme features and apply/book:



For more information, please visit:
raeng.org.uk/systems-workshops
or contact systems@raeng.org.uk



The Royal Academy of Engineering creates and leads a community of outstanding experts and innovators to engineer better lives. As a charity and a Fellowship, we deliver public benefit from excellence in engineering and technology and convene leading businesspeople, entrepreneurs, innovators and academics across engineering and technology. As a National Academy, we provide leadership for engineering and technology, and independent, expert advice to policymakers in the UK and beyond.

We have three goals:

Sustainable and Innovative Economy, where sustainability drivers, innovative industries and resilient infrastructures are aligned to drive growth and productivity that will support better lives for all.

Technology Improving Lives, where technology in all its forms is used to meet the most important human needs, avoid harm, support fairer societies and break down barriers to opportunity.

Engineering Community Fit for the Future, where our community reflects society in its diversity, commits to creating inclusive cultures to help drive engineering excellence, and has the skills to meet future needs safely, securely and ethically, and to keep pace with innovation.

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