

G-Cloud 15

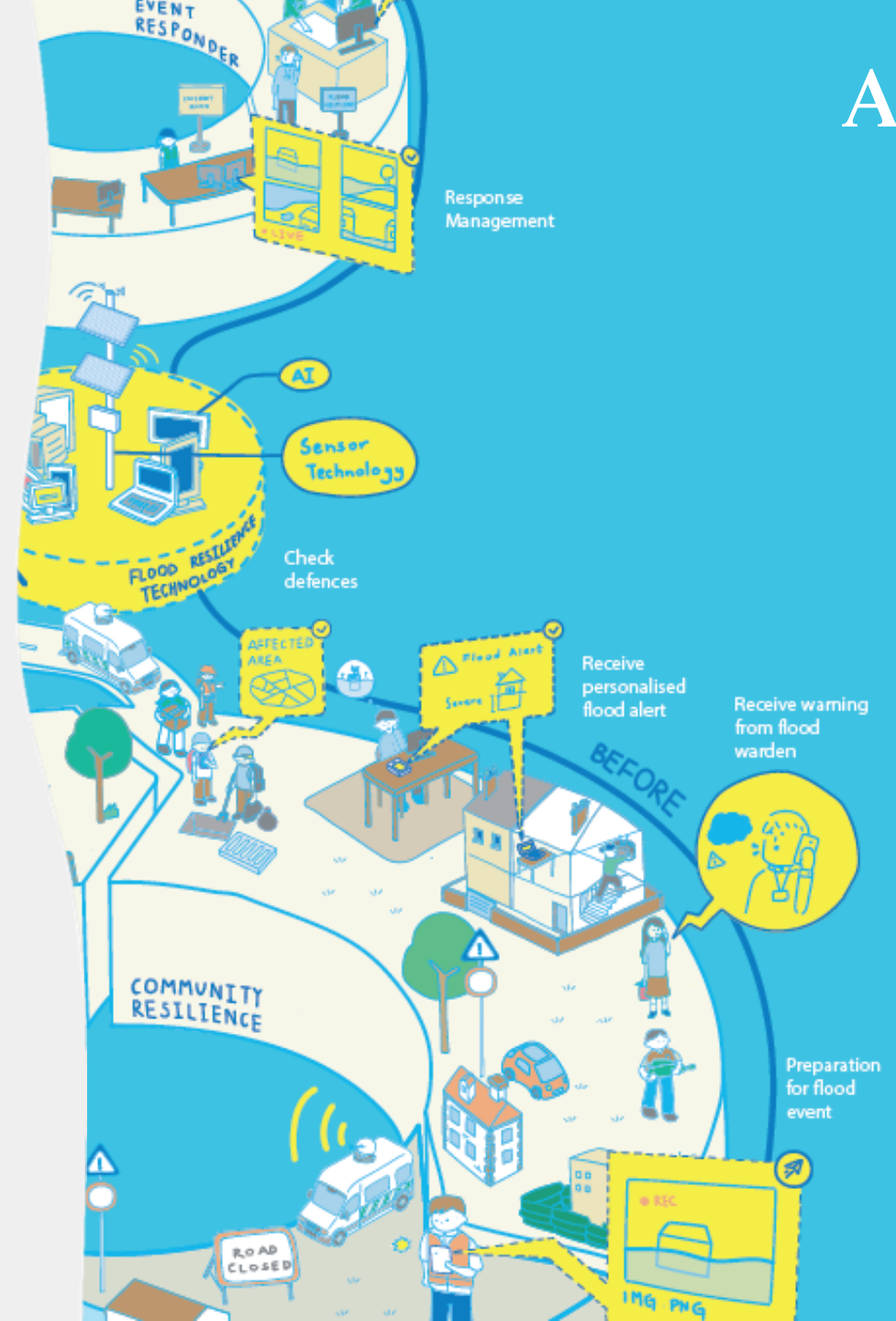
Digital service design and development

G-Cloud 15

Service definition document

Our firm

Arup is a global collective of designers, consultants and experts dedicated to sustainable development, and to using imagination, technology and rigour to shape a better world



Our aims

The aims and principles laid out by Sir Ove Arup in his Key Speech, continue to underpin our firm today

-  Social usefulness
-  Total architecture
-  Humane organisation
-  Straight and honourable dealings
-  Quality of work
-  Reasonable prosperity

Who we are

We combine digital expertise with market knowledge to advise on the role of digital and data in the built and natural environment

We deliver services and solutions that solve complex challenges for our clients



Our strategy

We work with clients, partner
and practitioners who share
our commitment to create a
sustainable future for
everyone



Our partnerships

From climate change to city resilience, our long-term collaborations help us to tackle some of the world's toughest problems



Some of our clients



Digital service design and development

Digital service design and development

Introduction

At Arup, we work with organisations to design, develop and deliver end-to-end GDS-compliant digital services through our understanding and application of user-centred design, user research, agile delivery methods, and the application of digital technology and data.

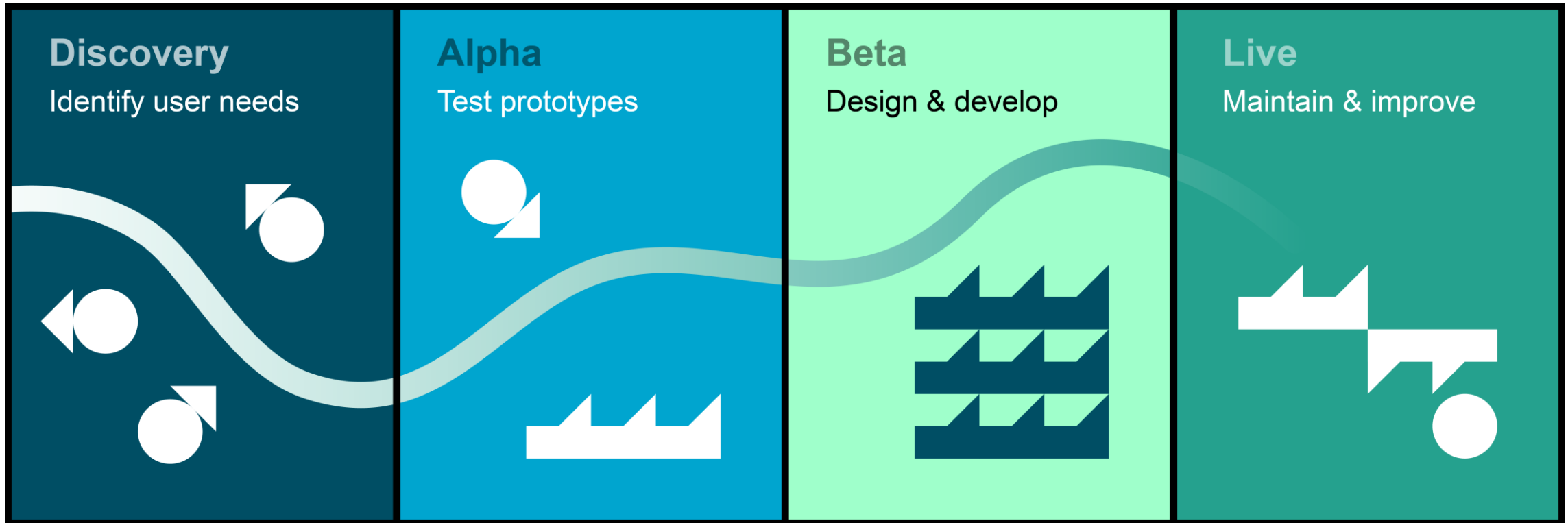
Our agile, multidisciplinary teams take solutions iteratively through discovery, alpha, beta and live phases to solve complex challenges for users and enable organisations' digital transformation.



Digital service design and development

End-to-end delivery

This service offering delivers across all stages of digital service design and development:



Features

Features

- End-to-end digital service design, development and delivery including discovery, alpha, beta and implementation into live
- Discovery phase to identify and validate user needs through primary and secondary research
- Alpha phase to test low-to-high fidelity clickable and coded wireframes and prototypes with end users for feedback, iteration and re-testing
- Beta phase to design and develop an end-to-end minimum viable product (MVP) digital service to meet user needs, including private and public beta testing
- Best design practice including UX (user experience), UI (user interface), service and content design, application of Design Systems (including GOV.UK and Arup's ARC)
- Modern development languages, frameworks and Cyber Essentials Plus-certified processes including front-end and back-end development, pen testing, and language and framework upgrades and implementing continuous integration and continuous delivery (CI/CD) pipelines (unit, automated and end-to-end testing)
- Best accessibility practice including WCAG 2.2 AA-alignment and accessibility audits

Features

Features

- Agile, Scrum and Kanban delivery to pivot rapidly to emerging change, including agile sprints
- Scalable and reliable cloud-based AWS and Azure hosting and infrastructure to meet existing and future requirements
- Discovery, alpha and beta GDS service assessments



Benefits

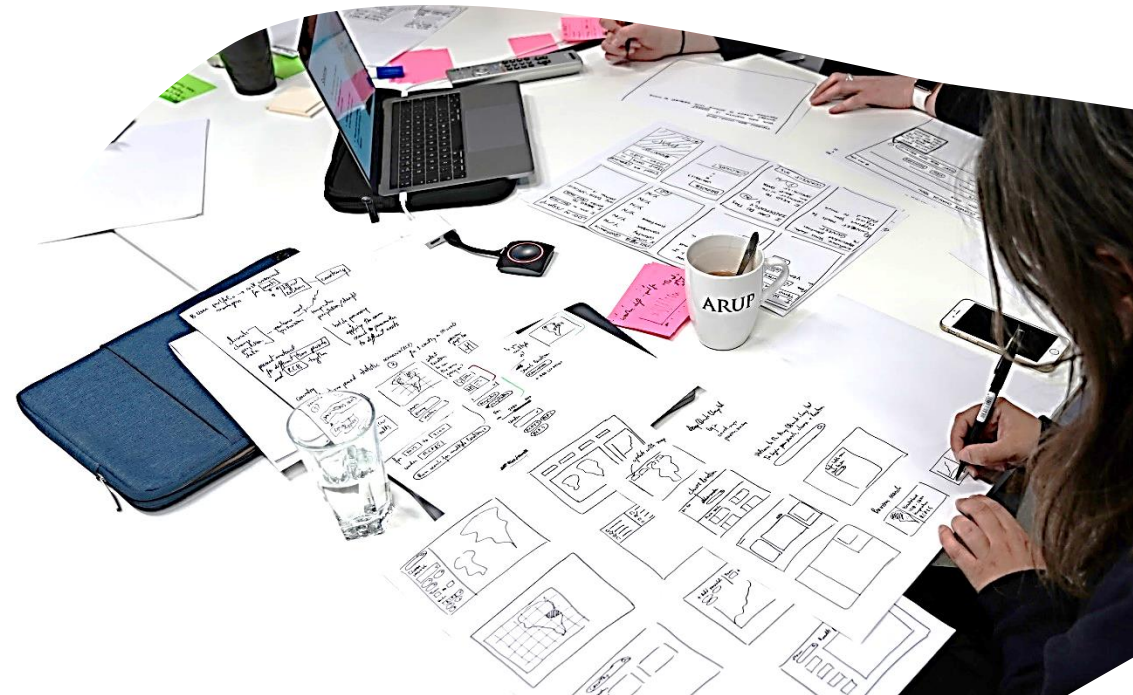
Benefits

- Aligned with the Government Digital Service (GDS) Service Standard, GOV.UK Technology Code of Practice and Scottish Digital Service Standard
- Proven digital delivery within built and natural environment sectors and subject matters, including cities, planning, architecture and construction, transport, water and resources, energy, climate, Geographic Information System (GIS) and others
- Upskilling of in-house teams in discovery, alpha and beta delivery, and agile and digital skills
- Ability to rapidly pivot to emerging change and re-prioritise through agile methodologies and deliver
- Identified and validation of user needs through discovery and primary research
- Applying user-centred design principles and practices to design alpha wireframes and prototypes that meet user needs
- Delivery of scalable, secure beta digital products and services that meet user needs

Benefits

Benefits

- Regular usability testing with end users to gather feedback and iterate on the solution's design
- Iterative cycles of prototype testing for end user feedback to enable continuous improvement cycles
- Measurement against Key Performance Indicators (KPIs) to identify service success





Department for
International Trade



Peru Reconstruction

Delivering a digital programme to support Peru

Arup worked with Peru Reconstruction to apply and adapt the UK Government's GDS (Government Digital Service) Service Standard framework.

Solutions were taken from discovery to live to support 500+ users from the UKDT (Arup, Mace, Gleeds), ARCC, Peruvian Government and supply chain. This included a common GIS data platform, data reporting and dashboarding, collaboration and document management systems, a learning platform, a GIS led cost/benefit analytics tool and collaborative BIM design software and workflow automation.



Discovery phase, alpha phase, beta phase