



How CACI's bespoke Digital Services Register enhances the deployment of RAF Digital's solutions

Summary

RAF Digital is a key component of the RAF, driving digital transformation and innovation. As the RAF becomes more data-centric, there is an increasing demand for mapping information flows, understanding the technology used to consume this data and managing associated costs.

The RAF Digital Architecture Function (AF) provides assurance and actionable guidance to programmes and projects from an Information Defence Line of Development perspective. As it continues to evolve in support of Air's digital transformation, there is a growing need to enhance governance, collaboration and consistency across programmes while operating within a broad and complex stakeholder landscape. Documenting artefacts and fostering a culture of reuse that reduces time, risk and cost are crucial as the AF matures, which led to the development of the Digital Services Register: a comprehensive repository of architectural patterns, services and standards for reference.

Challenge

- Historically, architectural artefacts were often developed in isolation, resulting in duplicated efforts and inconsistencies. This prompted the AF to adopt a more structured approach to knowledge management and improve continuity, decision-making and the reusability of architectural artefacts.
- As the function matures, its ways of working will naturally evolve to meet new demands and challenges. During this transition, external expertise will be vital in shaping best practices, refining methodologies and contributing to the development of architectural artefacts. Collaborating with industry partners will also help ensure that the AF remains agile, effective and well-positioned to support Air's long-term digital strategy.

Solution

To address the challenges faced by the RAF Digital Architecture Function (AF), the Digital Services Register was created to ensure the RAF would maintain consistency and efficiency in developing and deploying their digital solutions. Supplementary SME knowledge was also provided on the scoping and costing of new services, including offering guidance on best practices, identifying risks and aligning new projects with the RAF's digital strategy to further support this.

Experienced solution architects with a solid background in the Air Domain were also employed, working closely with desk officers and collaborating with other industry partners to refine the definition of Information Defence Line of Development (DLoD) services. A key focus was determining how these services, along with architectural patterns and standards, could be effectively documented within the Digital Services Register.

Throughout this process, the solution architects utilised a range of industry-standard tools to develop and manage architectural artefacts. However, after careful evaluation of various solutions, Mood's no-code software was identified as the most suitable platform for the development of the Digital Services Register. This decision was driven by Mood's ability to provide an intuitive and user-friendly interface while maintaining the rigour of formal architectural modelling.

Although the Digital Services Register adhered to the ArchiMate notation, its accessible design allowed end users to create ArchiMate-compliant artefacts without requiring prior knowledge of the notation. Additionally, through the use of a Model Exchange File, data could be seamlessly imported or exported into other tools.

Results

The Digital Services Register documents over 60 services and nearly 80 standards, creating a comprehensive knowledge repository. Supported by a robust governance model, it allows different permission groupings to perform specific functions within the tool. Administrator privileges have been granted to desk officers within the Architecture Function, enabling them to manage and maintain the tool independently without relying on support from CACI.

Initially rolled out to architects, the tool has since been expanded to include desk officers and programme stakeholders. The Digital Services Register is accessible via MODNet laptops, with login facilitated through seamless single sign-on technology. This means that users can collaborate cross-boundary, fostering an interactive and engaged user community.

Each service in the register is accompanied by metadata, including completeness and confidence scores, as well as point-of-contact details, equipping users with insight into the reliability and thoroughness of the information. Additionally, the tool features graphical representations that illustrate the relationships between services, highlight their specialisations and demonstrate how they connect to relevant standards. These visual aids further enhance the tool's usefulness for users across the RAF.

Now that the tool has been handed over to the desk officers, it has entered a phase of continuous improvement. To ensure the information remains accurate and relevant, monthly workshops are being organised by the desk officers. These workshops will focus on updating and refining the content, fostering ongoing collaboration and ensuring the tool evolves with the development of new services and standards.

Testimonial

"The register has the potential to fulfil an essential component of the work the Design Authority will do to cohere digital system evolution for the RAF. Understanding what the current state of the eco system will be vital to making the right decisions to move it forward. A place to curate this will be essential, and I think the Digital Services register can play that role and evolve as needed. The combination with guidance through elements of the design processes required was a surprise bonus."

Philip Bates, Technology Consulting Director, Darter