ROCCA and ToGAF implementation in Government Agencies

Based on academic sources, the integrated application of the Roadmap for Cloud Computing Adoption (ROCCA) and The Open Group Architecture Framework (TOGAF) provides a structured approach for government agencies implementing cloud solutions. This combined framework is posited to support strategic planning and ensure a robust alignment between an agency’s objectives and its technological infrastructure (Anggraini et al., 2019). The synergy of ROCCA's detailed roadmap and TOGAF's Enterprise Architecture methodology offers a methodical guide for digital transformation within the public sector, as further supported by a 2025 review that highlights the critical need for structured frameworks to overcome adoption challenges such as security and legal barriers (Alkhasawneh, Che Cob and Abdul Latif, 2025).

However, a critical analysis of this approach reveals significant limitations. The Anggraini et al. study, for instance, is a single-case study and its findings may lack generalisability to different governmental contexts, which often possess unique political and cultural dynamics. Critiques of TOGAF suggest that its highly structured, documentation-centric nature can be overly rigid and may lead to over-engineering, hindering the agility required for modern cloud projects (Kornyshova and Barrios, 2021). Some scholars argue that frameworks designed for the private sector fail to adequately address the socio-political complexities, bureaucratic inertia, and human-driven resistance to change prevalent in government (Hakimi, Ghafory and Fazil, 2024). This has led to the development of public sector-specific frameworks and the proposition of more flexible, multi-framework strategies, such as combining the Microsoft Cloud Adoption Framework with a Well-Architected Framework, to tackle the distinct challenges of public sector transformation more effectively.

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