

Data explosion: The challenges for Geoscience Australia

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Abstract

Current data holdings in Geoscience Australia exceed 700 terabytes and are growing apace. Geoscience Australia has a responsibility to meet the geoscience and geospatial information requirements of the nation, and so these vast and rapidly increasing data holdings present a significant set of challenges. The cost just of storing such large amounts of data is a significant issue for agencies like Geoscience Australia that have a prime custodial role. There are then all the issues associated with ensuring that the information content within these data holdings is accessible and discoverable, and that information will not be destroyed as a consequence of choices made in how to store the data. For the scientist there is the critical question of how to structure data so that those data facilitate the answering of critical questions; if structured poorly vast data sets can obscure the relevant information content and swamp an investigator with irrelevancies. Within Geoscience Australia the different research groups and the Corporate Information Management and Access (CIMA) group are working to achieve the best responses to these challenges.

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