Grounding the Cloud

Co-creating a sustainable, community-inclusive data centre industry

TD Research

Data centres, often described as 'the cloud', now sit at the core of Australia's digital and AI ambitions. Yet as more than $100bn in hyperscale developments gather pace, the impacts of this rapid expansion are becoming increasingly visible across Sydney's Northern and Western suburbs. These facilities are vital, but they are also resource-intensive, reshaping local energy and water systems and altering the amenity of nearby neighbourhoods. Communities living closest to these changes feel the noise, heat, traffic and environmental pressures of 24/7 operations, yet have limited ability to help steer how the sector grows. Without thoughtful intervention of decision-making risks that are concentrated in government and industry, communities shoulder the burdens, while benefits flow elsewhere—undermining trust and weakening social licence.

So how might NSW reimagine the future of data centres in ways that align with local values, priorities and aspirations—ensuring these essential facilities can become genuinely better neighbours?

Project Overview

This project brings together a transdisciplinary team to investigate two key questions:

1. How are local communities experiencing and responding to data centre developments in their locality?
2. How can the dominant policies and priorities shaping the NSW data centre transition be broadened to incorporate community values and priorities, and in doing so enable the State to become a more equitable and sustainable place for data centres?

Working with industry, government and community partners, this research will deliver a holistic roadmap that integrates social, economic, environmental, technological and policy considerations. Fieldwork will focus on key development hotspots in Sydney where data-centre growth intersects with local communities.

By examining how current plans shape local impacts—and identifying practical opportunities to reduce pressures and deliver long-term benefits—the project aims to turn a complex challenge into a positive pathway for NSW's future.

Our Impact

A core output of this project is a strategic roadmap guiding decision-makers toward a sustainable and equitable data centre industry. It highlights four levels of transformative action:

- Strategic – Aligning growth with Net Zero and energy transition goals.
- Collaborative – Partnering across government, industry and community.
- Innovative – Delivering forward-looking, actionable recommendations.
- Cultural – Strengthening social licence and long-term trust.

This project will shine a light on how local communities across Sydney are experiencing, making sense of, and responding to data centre expansion in their locality. Through systems thinking, collaboration and transformative approaches, the final roadmap will detail a breadth of policy pathways and actions that government, industry, and local communities can take to collectively create a more community-inclusive data centre industry in NSW, Australia and beyond.

Work with us

We deliver a wide range of research projects for public and private sector partners seeking research expertise and support in overcoming their complex challenges using our unique transdisciplinary (TD) methodology. To find out how TD Research can help you and your organisation, please email - **TDResearch@uts.edu.au**

INDUSTRY PARTNER

This research project is funded by the Australian Public Policy Institute.

PROJECT PARTNERS

UTS Transdisciplinary School (TD School), UTS Institute for Sustainable Futures, UTS Design and Society and Monash University.

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