



# Seeding the Australian Data Commons by blurring the boundaries

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## Overview

- Seeing the boundaries
- Seeing the possibilities
- Engaging researchers
- Research data registry
- The registry in action
- Building identity – Internal and external drivers

- Research reporting
  - Institutional marketing
  - HR data
  - Finance data
  - Research data compliance
  - Research data storage
  - Public researcher identity
  - Researcher collaboration
  - Data commons
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- Policy – 2005, review 2009
    - Good start but not enough
  - Audit – 2007, 2009
    - Policy and compliance is off the radar for most
    - Compliance – patchy
    - Storage – ad hoc
    - Local registers
    - Risk management
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Central resources are the missing key to enabling compliance

- **Central storage** – a petabyte-scale Research Data Centre for Parkville Precinct
  - **A Central research data registry**
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- **Definition** This is an institution-wide record of all research data and records stored in the university. At a minimum, the Central Registry will include a description of the research data and records, the name(s) of associated researchers and projects, the location of the data (digital and analogue), access restrictions, and relocation and disposal schedules.
  - **Intended scale (biggish)**
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A central research data registry happens in the context of a richly described research context:

- Grants, Publications, Research Program, External and Internal Researchers, and departments
  - All of this information exists and should be reused in the registry...
  - Should not be an information silo
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Piggybacking on our public researcher profile system - 'find an expert' dataset...

<http://www.findanexpert.unimelb.edu.au/>

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- From Publications to Research data Sets
  - The initial process
  - The output
- Feedback from the Faculty (so far)



(1) Pre seed Data Registry with Find an Expert data



(2) Scan for references to data in publications

(3) Create Skeleton Research Data Record

(4) Infer as many of the details about the research data record from the publication



The image displays three overlapping screenshots of the Central Research Data Registry website. The top-left screenshot shows the 'Architecture, Building and Planning' category with a list of research data custodians including Ahmed, Shondkar (DR), Ashford, Peter (MSc), Barriss, Joseph (DR), and Bennett, Sohan (MSc). The top-right screenshot shows the profile for 'HEYWOOD, CHRISTOPHER (DR)' with details on affiliation (Architecture, Building and Planning) and homepage (http://www.abp.unimelb.edu.au/staff/heywood.html). The bottom-center screenshot shows a detailed view of a research data entry titled 'research data for A consumer-oriented technique for planned residential developments' with a description of the empirical study and its custodian, Christopher Heywood.



## Profiling our research

- Internal drivers
- National drivers
- Global drivers



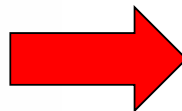
**University Plan 2009:** Agree and implement **cross-disciplinary and cross-faculty research themes** for strategic focus and investment as part of a research strategy

**Problem:** How to create identity around a cross disciplinary theme?



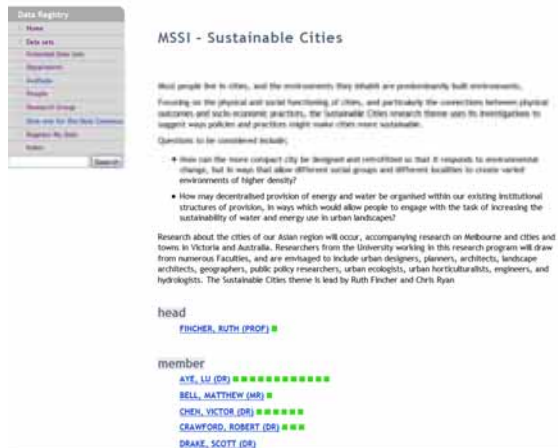
## Strategy 1

- Use the cohort of researchers defined by a research theme to define a customized 'find an expert' portal...



## Strategy 2

- Use the collection of research data ‘assets’ associated with researchers in the theme to aid collaboration discovery and help reinforce identity



The screenshot shows a 'Data Registry' interface for 'MSSI - Sustainable Cities'. It includes a sidebar with navigation options like Home, Data sets, and Research. The main content area contains a title, a paragraph of text, a list of bullet points, and a list of researchers categorized as 'head' and 'member'.

**MSSI - Sustainable Cities**

Most people live in cities, and the environments they inhabit are predominantly built environments. Focusing on the physical and social functioning of cities, and particularly the connections between physical outcomes and socio-economic practices, the Sustainable Cities research theme uses its investigations to suggest ways policies and practices might make cities more sustainable.

Questions to be considered include:

- How can the more compact city be designed and rethought so that it responds to environmental change, but in ways that allow different social groups and different localities to create varied environments of higher density?
- How may decentralised provision of energy and water be organised within our existing institutional structures of provision, in ways which would allow people to engage with the task of increasing the sustainability of water and energy use in urban landscapes?

Research about the cities of our Asian region will occur, accompanying research on Melbourne and cities and towns in Victoria and Australia. Researchers from the University working in this research program will draw from numerous faculties, and are encouraged to include urban designers, planners, architects, landscape architects, geographers, public policy researchers, urban ecologists, urban horticulturalists, engineers, and hydrologists. The Sustainable Cities theme is led by Ruth Fischer and Chris Ryan.

**head**

FIISHER, RUTH (PROF)

**member**

AYE, LU (DR)

BELL, MATTHEW (MR)

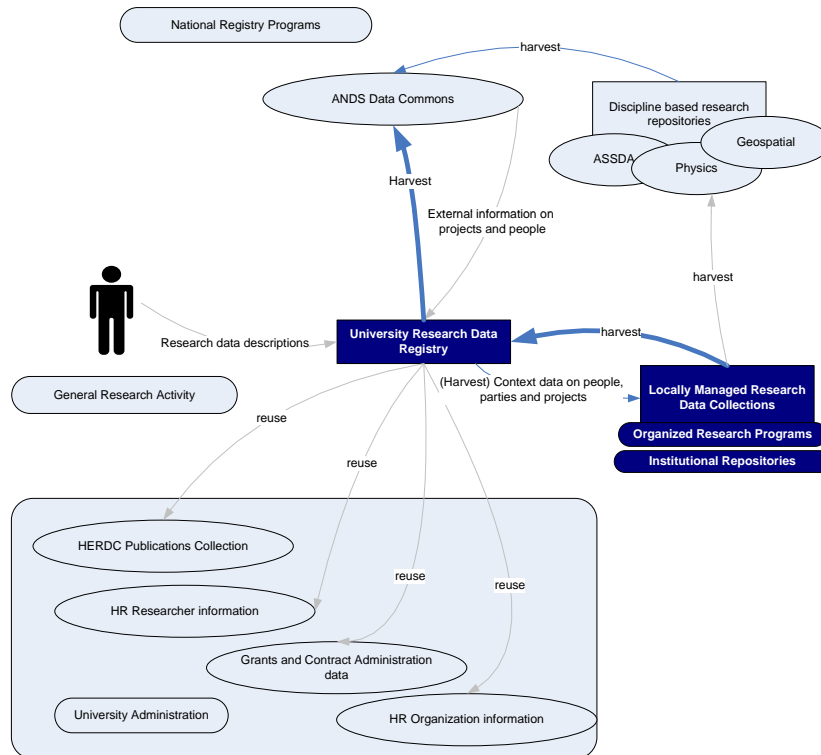
CHEN, VIKTOR (DR)

CRAWFORD, ROBERT (DR)

DRAKE, SCOTT (DR)

- In the process of recording research records, we are encouraging researchers to let high level metadata associated with their project be made available to the data commons.
- The case to do this is particularly strong for research themes
- Variable reception across/within disciplines





- Current versus eternal research records
- Retrospective task is massive
- Cultural barriers
- Suspicion of role and purpose of a Data Commons
  - Untested
  - Competes with discipline based 'Commons'



- We have deliberately completed this work with the idea that what we do can be adopted up by other research organisations
  - We would love to hear from you if you want to explore options further
    - [simon.porter@unimelb.edu.au](mailto:simon.porter@unimelb.edu.au)
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