

Given increasing pressures from population growth and land use change, Australian researchers require access to high-value water and energy (WE) consumption data for planning and policy-making in urban environments.

AURIN and CSIRO collaborated in 2015 to develop a protocol to harmonise these datasets, that led to the creation of the WE Supply and Consumption (WESC) model. Recently, the EUDM/NEAR projects extended the WESC model to handle new classes and proposed new elements.

Towards operationalising the model for the provision of new data, this project will evaluate the extended model to address the following questions:

- What is Australian researcher feedback on the value of the data supplied via the current, extended WESC model?
- Does the extended WESC model need to be further modified to handle other/new kinds of WE data?
 What is needed to update the existing AURIN-CSIRO WESC hub with new data and make it FAIR?
- How can WE utilities be incentivised to participate for sustainability of the AURIN-CSIRO WESC hub?

Investment by ARDC \$50,000 Co-investment partners Australian Urban Research Infrastructure Network - AURIN) University of Melbourne CSIRO	Expected completion	date
Co-investment partners Australian Urban Research Infrastructure Network - (AURIN) University of Melbourne CSIRO	21 October 2019	
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University of Melbourne	Australian Urban Researc	ch Infrastructure Network -
CSIRO	(AURIN)	
	University of Melbourne	
Lead node	CSIRO	
	Lead node	
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2. Gap analysis

Analyse stakeholder responses (users and data service representatives) together with existing WE data, then conduct a gap analysis.

4. Project report

1. Interviews and online survey of stakeholders

Survey user/context of WE data across Australia. Survey data services to understand their motivations, opportunities and constraints for sharing data. Conduct interviews with data services representatives in person and via telephone.

3. Forum

Present the extended WESC model, summarise analysis results, acquire feedback and comments, discuss the feasibility of extending WESC further to meet additional user requirements and discuss how FAIR principles might be adopted in an updated AURIN-CSIRO WESC hub.

5. Completion of project

Project outcomes will be presented at the ARDC Data & Services Summit in October 2019.

Core features



FAIR data

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Community engagement

An enhanced collection of Water and Energy supply and consumption data covering a greater portion of Australia.

Community involvement in developing the WESC data standard to meet the needs of Water and Energy Utilities and researchers.

Who is this project for?

- Water and Energy Suppliers and Retailers
- · Research organisations
- Government (state and commonwealth)

What does this project enable?

Improving the FAIRness and coverage of AURIN's Water and Energy data holdings, which are of high value to researchers looking at past, present and future scenarios in human settlements, and planning and policy change to address both local and national needs.

Handy resources

- FAIR assessment and Final Report[PDF 900KB]
- <u>Presentation</u> [PDF 400KB]
- Developing the Water and Energy Supply and Consumption
 Data Standard <u>Project website</u>









