



THE UNIVERSITY OF
SYDNEY

Digital dentures: the future for aged-care residents

Report prepared for Dr Jerry Schwartz



Improving oral health, dignity and quality of life for older Australians

The Sydney Dental School's Digital Denture Program has continued to improve access to dental care for residents living in residential aged care facilities (RACFs), while also creating valuable learning and research opportunities for future oral health professionals. This innovative program combines mobile dentistry, digital denture technology and interdisciplinary aged care practice to address significant barriers faced by older adults, particularly those living with complex health conditions, disability and dementia.

Dr Schwartz, your generosity has helped Associate Professor Archana Pradhan and her team continue their important work improving oral health care for older Australians. Through the delivery of digital denture services in RACFs, together with student training and research initiatives, your support is contributing to person-centred care that promotes dignity, wellbeing and a better quality of life for residents.

Project update

During 2025, the CERA Oral Health Team provided onsite dental and denture assessment and treatment to 118 residents across five RACFs.

Residents identified through the aged care facilities and their families received comprehensive oral health assessments. Existing full and partial dentures were assessed and cleaned, and where suitable, dentures were digitally scanned to create records that can support future replacement if required. Dentures were repaired, relined or remade as necessary.

A dental prosthetist worked alongside students, demonstrating digital scanning techniques and supervising their clinical learning. The program also provided specialised toothbrushes and oral hygiene education to residential aged care staff to support ongoing oral health care for residents.

The program has continued to expand in 2026. With the addition of two Doctor of Clinical Dentistry (Special Needs Dentistry) students, a wider range of dental treatments is now being provided. The team is treating an average of ten residents per clinic compared with six residents during 2025. To date, treatment has been provided to 32 residents, with eight residents receiving full or partial dentures.

Alongside clinical care, the project continues to support research examining oral health care in aged care settings and the impact of digital health technologies for older Australians.



RECOGNITION

On 6 August 2026, Northcott's Healthcare & Clinical Governance team received the HESTA Excellence Award for Disability Services – Team Excellence, recognising its partnership with the University of Sydney School of Dentistry to deliver free, disability-competent preventive dental care. The team will reinvest the prize money into the program to enhance care and support for people with disability.

Project highlights

Expanding access to care:

The program has delivered specialist dental and denture services directly within residential aged care facilities, reducing access barriers for residents who may otherwise struggle to receive treatment.

Introducing innovative digital denture technology:

Digital scanning technology enables dentures to be recorded and stored electronically. This can simplify replacement processes in the future, particularly for residents living with cognitive impairment or complex health needs.

Building the next generation workforce:

The program provides hands-on experience for Doctor of Dental Medicine (DMD) students and Doctor of Clinical Dentistry (Special Needs Dentistry) students, exposing them to aged care practice and interdisciplinary care models.

Improving resident wellbeing:

Feedback from families suggests that the program's impact extends far beyond dentistry, improving comfort, dignity, quality of life and care practices within aged care facilities.

Student reflections

"I found it immensely useful and eye-opening."

"My compassion for the elderly has grown as I see this as a field that is in need of reform and help."

"It was such a valuable experience and is like nothing else I've done before in dental school."

"It was a whole new world of dental care that I was unaware of."

"This was such a great start into digital denture work. SUCH a vital and realistic part of what the real work is like."

Feedback from a resident's family member

"I was thrilled this option existed, since conventional replacement dentures weren't feasible given her advanced dementia. When her dentures were removed for scanning, serious oral neglect was noted... It's a huge comfort knowing her dentures can easily be replaced if needed, that she can maintain the dignity that still matters to her, that she is no longer being unnecessarily medicated, and that she can keep enjoying her food."

Priorities for the coming year

The team is excited to build on the momentum achieved to date. Thanks to your ongoing support, Dr Schwartz, we are well positioned to continue delivering innovative dental care to aged care residents, provide valuable clinical learning experiences for students, and generate research that has the potential to improve care practices more broadly. Key priorities for the coming year include:

- Continuing the provision of digital dentures at CERA-associated residential aged care facilities within Sydney Local Health District.
- Expanding services to additional clinical placement locations, subject to the establishment of placements at Northcott, Parramatta and Broken Hill.
- Completing interviews with families and carers of residents who have received digital dentures.
- Continuing dissemination of findings through publications, conferences and academic presentations.
- Presenting outcomes at the International Association for Disability and Oral Health (iADH) Conference in Dublin in August 2026.
- Presenting outcomes at the International Association for Dental, Oral and Craniofacial Research (IADR) Conference in Melbourne in June 2027.

Planned publications include contributions to *Clinical Decision Making in Gerodontology* (Springer Nature) and ongoing research evaluating mobile dentistry and digital dentures in aged care placements.

Thank you



Dr Archana Pradhan
Associate Professor,
Sydney Dental School,
University of Sydney

“Thank you, Dr Schwartz. Your generous support has had an impact far beyond dentistry. It has enabled a pioneering model of interdisciplinary aged care practice, the first of its kind in Australia, while enriching students’ learning and fostering greater understanding of caring for older people with complex needs. Your contribution has supported the delivery of specialist dental services, advanced much-needed research, improved oral health care for residents, and enhanced their quality of life. It has also contributed to improved care practices within residential aged care facilities, including behaviour management and oral health protocols. We are deeply grateful for your commitment to this important work.”

Dr Schwartz, the University of Sydney sincerely thanks you for your generous support of Associate Professor Archana Pradhan’s work and the Digital Dentures in Aged Care program. Your contribution is helping to advance oral health care for older Australians while supporting student education and important research in this growing field.

By investing in this initiative, you are helping to create opportunities for future dental professionals to develop skills and experience in aged care environments, while also supporting work that seeks to improve outcomes for residents living in residential aged care facilities. Your generosity is helping to strengthen both current practice and future knowledge in geriatric oral health.

We are grateful for your partnership and for the meaningful difference your support continues to make through education, research and patient care.

For more information

Debra Almeida, Senior Associate Director of Development,
Faculty of Medicine and Health
T +61 457 684 168 E debra.almeida@sydney.edu.au
sydney.edu.au
CRICOS 0026A



THE UNIVERSITY OF
SYDNEY

Appendix

Publications:

- Pradhan A. Influence of Systemic Health- Cognitive Decline. In: Ed Ettinger R. Clinical Decision Making in Gerodontology. Springer Nature. In press.
- Pradhan A. Dementia, institutionalization, and risk of falls and its relationship with oral health. In: Ed Ettinger R. Clinical Decision Making in Gerodontology. Springer Nature. In press.
- Pradhan A, Happy ZS, Akhter R, Rudman A, Ajwani Shilpi. Evaluation of Mobile Dentistry and Digital Dentures in Aged Care Placements. Frontiers. Submitted 30 June 2026.

Dissemination at conferences, scientific and academy meetings:

- International Association for Disability and Oral Health (iADH) Conference, Dublin, Aug 18-22, 2026
- International Association for Dental, Oral, and Craniofacial Research (IADR) Conference, Melbourne, June 23-26, 2027.