The A-PRECISE Project

Challenges and opportunities for effective infection prevention and control in Residential Aged Care Homes

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Acknowledgements

Preventing Infections. Together

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Residents, family members and staff at our partner organisations





Bridget Robinson
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Funder

National Centre for Healthy Ageing









Royal Commission into Aged Care Quality and Safety (2018-2021)

Inadequate IPC Practices

Significant shortcomings in IPC measures, deficiencies contributed to the rapid spread of infections, including COVID-19, among residents and staff.

Insufficient Staff Training

A notable gap in comprehensive IPC training for aged care staff was observed. The lack of proper education and resources hindered the effective implementation of infection control protocols.

Overuse of Antimicrobials

The report raised concerns about the high levels of inappropriate antimicrobial use in residential aged care services, which can lead to antimicrobial resistance.

Regulatory Oversight

Emphasised the need for stronger regulatory mechanisms to ensure compliance with IPC standards, advocating for more rigorous monitoring



Royal Commission into Aged Care Quality and Safety (2018-2021)

RECOMMENDATIONS

1. Mandatory Infection Prevention and Control Leads

Every residential aged care service must appoint a dedicated Infection Prevention and Control (IPC) Lead. The IPC Lead must be trained in IPC principles and play a key role in educating staff, monitoring infection risks, and ensuring adherence to protocols.

2. Improved IPC Training for Aged Care Staff

All aged care workers should receive mandatory, ongoing training in IPC measures, tailored to their specific roles. Training should cover hand hygiene, PPE use, outbreak management, and antimicrobial stewardship.

- 3. Strengthening Regulatory Oversight and Compliance
- 4. Enhanced Outbreak Preparedness and Response
- **5. Antimicrobial Stewardship Programs**
- **6. Increased Government Support and Funding**
- 7. Integration with Broader Healthcare System

Meanwhile, COVID-19...





frontiers | Frontiers in Public Health

TYPE Community Case Study DOI 10.3389/fpubh.2023.115598

Pandemic response: development and delivery of IPC training



Training roll-out: largest state funded ACCESS program to date

- >4200 participants
- >275 organisations
- face to face education
- train the trainer
- virtual reality simulation

The gap: need for tailored IPC strategies in residential aged care

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RECEIVED 01 February 2023 ACCEPTED 05 May 2023

Practical infection control training for Victoria's aged care workforce at the time of COVID-19 pandemic: a community case study

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The A-PRECISE Project



Australia – PReventing infECtions In reSidential agEd care

The goal: co-design an IPC strategy for the residential aged care

environment with residents, families and staff



Codesign

Codesign research also known as co-creation or participatory design,

emphasises collaboration between researchers and stakeholders

(e.g., patients, clinicians, community members, or policymakers)

throughout the research process

Dimension	Codesign Research	Quantitative Research	Qualitative Research
Purpose	Co-create solutions with	Test hypotheses, measure	Understand experience,
	stakeholders	variables	meanings, perspectives
Participant	Co-researchers, contributors	Subjects/respondents	Informants, meaning-makers
Role			
Power	Shared decision-making	Researcher-led	Researcher-led but empathetic
Dynamics			and open
Data Type	Mixed	Numeric, structured	Textual, unstructured
Methods	Workshops, storyboarding,	Surveys, experiments,	Interviews, focus groups,
	feedback loops	structured observations	ethnography
Outputs	Interventions, tools, services,	Statistical models,	Thematic, narratives, theory
	frameworks	generalizable findings	generation
Context	Highly contextual, tailored to	Less sensitive to context	Strong contextual focus
Sensitivity	local needs	(generalisable)	
Strengths	Relevance, inclusion, buy-in, innovation	Rigor, scalability, precision	Depth, meaning, complexity
Limitations	Time-consuming, hard to	May miss context and	Less generalizable, can be
	generalize	complexity	subjective
Typical Use	Designing interventions,	Clinical trials, surveys,	Exploring patient experiences,
Cases	services, health programs	population studies	behaviour, culture

Stage 1 examine the context, facilitatrs/barriers for effective IPC practiced in RACHs Stage 2 Develop and pilot test e-tool for PPS of HAIs in RACHS Stage 3 Co-design a IPC education resource to support IPC practcie in aged care workforce Stage 4 Implement and evlautae strategy

A-PRECISE Stages

 Stage 1. Examination of the context, facilitators and barriers for effective infection prevention and control (IPC) practices.

Interviews/Focus Groups with consumers (residents and family) and staff. Context of RACH IPC practices

• **Stage 2.** Develop and pilot test an electronic tool for point-prevalence surveillance (PPS) of healthcare-associated infections in RACHs.



Point prevalence surveillance of infections

"How many residents have an infection today, and what type of infection?"





Urinary tract infection

COVID-19

Respiratory tract infections

- · Common cold syndromes/pharyngitis
- Influenza-like illness ('Flu')
- Pneumonia
- Other lower RTIs

Skin infections

- Cellulitis/soft tissue/wound infection
- Scabies
- Herpes simplex or zoster infection
- Fungal infections

Gastrointestinal tract infections

- Gastroenteritis
- Clostridioides (Clostridium) difficile infection

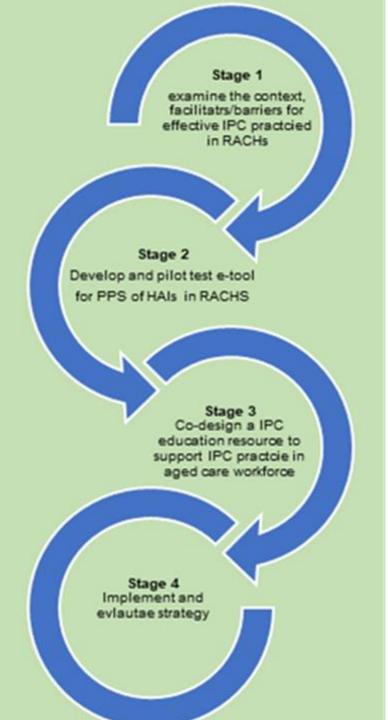
Eye, ear, nose and mouth infections

- Conjunctivitis
- Ear infections
- Sinusitis
- · Mouth infection or oral candidiasis

Bloodstream infections

Unexplained febrile episode

Other infection(s)



A-PRECISE Stages

• Stage 1. Examination of the context, facilitators and barriers for effective infection prevention and control (IPC) practices.

Interviews/Focus Groups with consumers (residents and family) and staff. Context of RACH IPC practices

- **Stage 2.** Develop and pilot test an electronic tool for point-prevalence surveillance (PPS) of healthcare-associated infections in RACHs.
- **Stage 3.** Co-Design of the strategy to be implemented e.g. education, multimedia and other resources

Three co-design workshops:

- 1) Exploration & Discovery
- 2) Drafting
- 3) Review, Refine & Plan
- 4) Findings from Stages 1 & 2 will inform the co-design of the strategy to be implemented in Stage 4.
- Stage 4. Implementation of the developed strategy and the PPS tool and evaluation of the effectiveness .

Understanding the context



Interviews and focus groups: 22 people (residents, families and staff)















What did people tell us?



Challenges: variability in IPC knowledge, cultural practices, organisational culture, engagement in education

Opportunities: multi-layered approaches, interactive learning, knowledge building, proactive communication, positive organisational culture

Themes

- Communication
- Culture
- Education

Communication

Diverse, simple, proactive

"It is very difficult when, you know, maybe things are being done but maybe they're not, but you just don't get that communication."

- Family member

"We've got to be vocal."

- Resident

"The more you write the less they read."

- Staff member



Culture



Resident-centred, open and transparent, everybody's business



"I think they do things very well here and keep us all safe."

- Resident

"If there's an issue, I would mention it to the immediate carer... I find all the staff very approachable."

- Family member

"Every person that works within residential aged care has got a responsibility with infection prevention and control."

- Staff member

Education

Engaging, in person, complementary

"I think it really just comes down to the staff being educated."

- Family member

"Nothing like being at the coal face for these things."

- Resident

"We're more proactive... and less reactive now [post-pandemic]."

- Staff member



Developing the strategy





Resources created



- Posters (editable, various messages)
- Videos (residents, visitors, staff)
- Audio messages (mealtimes, hold message)
- Escape room educational materials (UTI, skin/wound, gastro, respiratory)
- Written material templates/examples
- Overarching guidelines
- E-tool for infection monitoring



IT'S OK
TO REMIND US

It's okay to remind each other about hand hygiene. It helps keep us all safe.

National Centre for Healthy Ageing



This is our home.







DON'T VISIT WHEN UNWELL

Feeling unwell?
Please don't visit.
It helps keep us all safe.

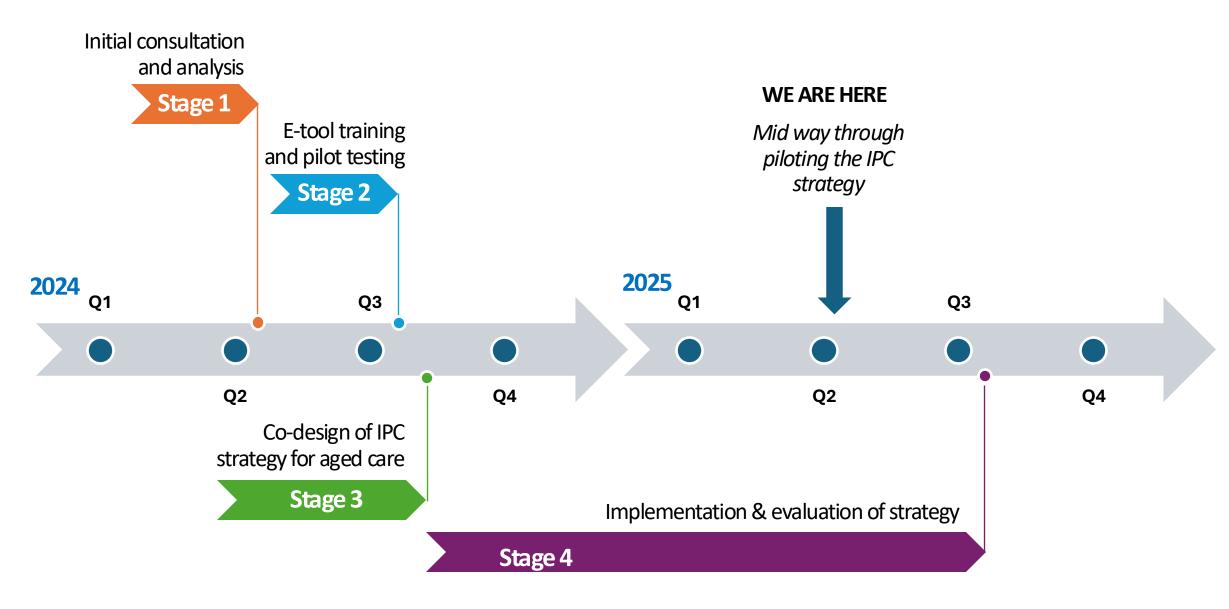
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Current status



Visitor video



Thank you



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Preventing Infections.
Together