

Responsive Behaviours In Cognitive Impairment:

Using Simulation To Teach A Team To Provide Care Through A Trauma-informed Lens

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Background

1/5 seniors were admitted to hospital between 2015-2016



1/3 had multiple admissions.



(Canadian Institute for Health Information, 2026)

While the precise prevalence of personal trauma in hospitalized older adults is unknown, an estimated 76% of Canadians have experienced a traumatic event (Canadian Psychological Association, 2025). Trauma-informed care is well examined and understood within psychiatric, emergency and hospice settings, but there is limited evidence of its impact on geriatric inpatients within a subacute hospital setting (Cations, et al., 2021). Skill and confidence in management of responsive behaviours have been inversely correlated to the use of chemical restraints, commonly in the form of antipsychotics (Soun, Hunter & Dahlke, 2023). Antipsychotic use in older adults is considered to have low efficacy and is associated with higher mortality (Cations, et al., 2021). An exploratory study was conducted to examine how education on trauma-informed care impacts the management of responsive behaviours on a transitional care unit.

Methods

- Exploratory pre-post study design.
- Setting: Two transitional care units totaling 60 beds.
- Participants: Interprofessional staff caring for older adult inpatients with cognitive impairment.
- Intervention: Simulation-based educational
- Outcomes: Incident reports, chemical restraint use, staff confidence, and Burnout scores at 3 and 6 months-post intervention.
- Tools: Safety reporting system, medication administration records, NLN confidence scale, Maslach Burnout Inventory.

Results

➤ Physically Responsive Behaviours

Pre-Intervention

- Mean monthly incidents = 3.2 (SD = 1.9)

3-Month Post-Intervention

- Mean monthly incidents = 2.7 (SD = 1.2)

Change

- Reduction of 0.5 incidents per month
 - Approximately 15.6% decrease in reported incidents
- Physical aggression incidents declined from 4 incidents in February 2026 to 2 incidents in both March and April 2026, suggesting improved behavioural stability following the educational intervention.

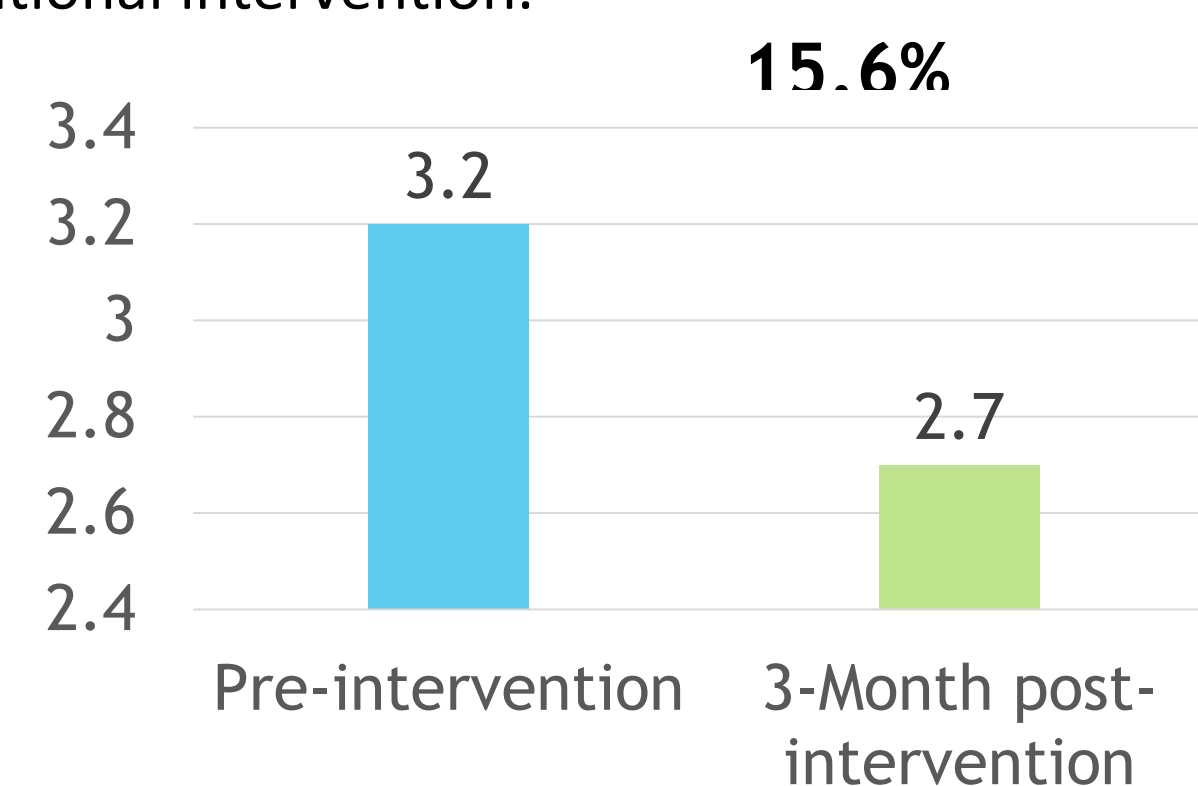


Figure 1. Comparison of Pre-Intervention and 3-Month Post-Intervention Incident Frequency

➤ Chemical Restraint Utilization

Pre-Intervention

- Mean = 0.41 doses per patient per week.

3-Month Post-Intervention

- Mean= 0.26 doses per patient per week

- SD= 0.21

Change

- Reduction of 0.15 doses per patient per week
- Approximately 36.6% decrease

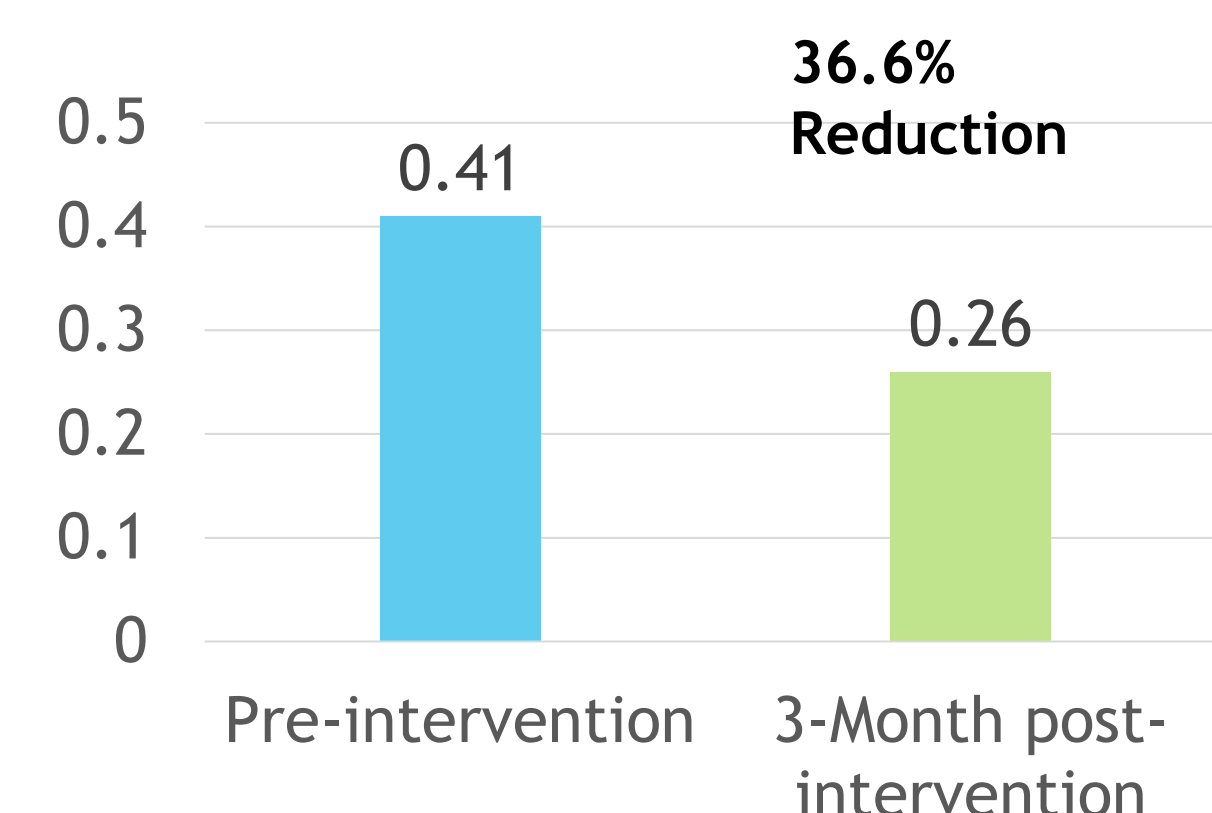


Figure 2. Comparison of Pre-Intervention and 3-Month Post-Intervention Chemical Restraint Utilization

➤ Staff Burnout (Maslach Burnout Inventory)

Pre-Intervention vs 3-Month Post-Intervention

The intervention was associated with improvements across all three burnout dimensions.

- Emotional exhaustion decreased by 24.4%, suggesting reduced work-related fatigue and stress.
- Depersonalization decreased by 29.7%, indicating improved patient-centered engagement.
- Personal accomplishment increased by 11.8%, reflecting greater professional confidence and perceived effectiveness.

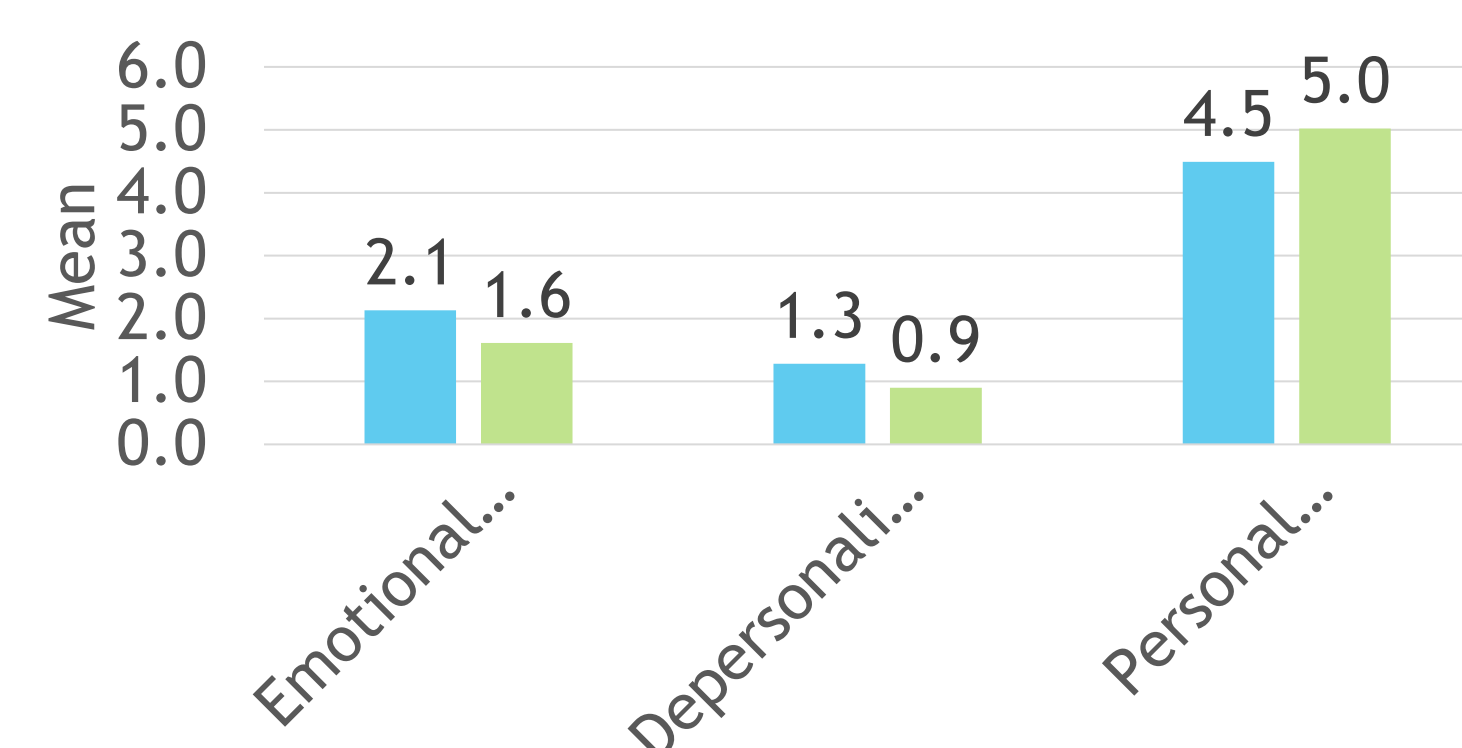


Figure 3. Comparison of Pre-Intervention and 3-Month Post-Intervention Burnout Outcomes (MBI)

Conclusion

Delivery of trauma-informed care education through simulation was associated with:

- Reduced responsive behaviour incidents (15.6% decrease)
- Reduced chemical restraint utilization (36.6% decrease)
- Lower emotional exhaustion (24.4% decrease)
- Lower depersonalization (29.7% decrease)
- Increased personal accomplishment (11.8% increase)

These early findings suggest that education on trauma-informed care may be a promising strategy for managing responsive behaviours in hospitalized older adults and supporting staff well-being within transitional care units.

References



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