A Systematic Review of the Impact of Intentional Rounding on Patient Safety in Acute Care

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Intentional Rounding (IR)

- Purposeful and structured bedside rounds
  - Occur at set intervals
  - Standardised protocols (comfort, pain, toileting)
  - Accessibility of call bell, drinks etc.
  - Physical presence of nurse gives a sense of attentiveness

- Promoted as a way to improve patient safety
  Ensure fundaments of care are not overlooked

The Review

Aim

Synthesis evidence on the impact of IR on patient outcome and staff related outcomes (patient safety)

Design

JBI methodology for systematic reviews

Search methods

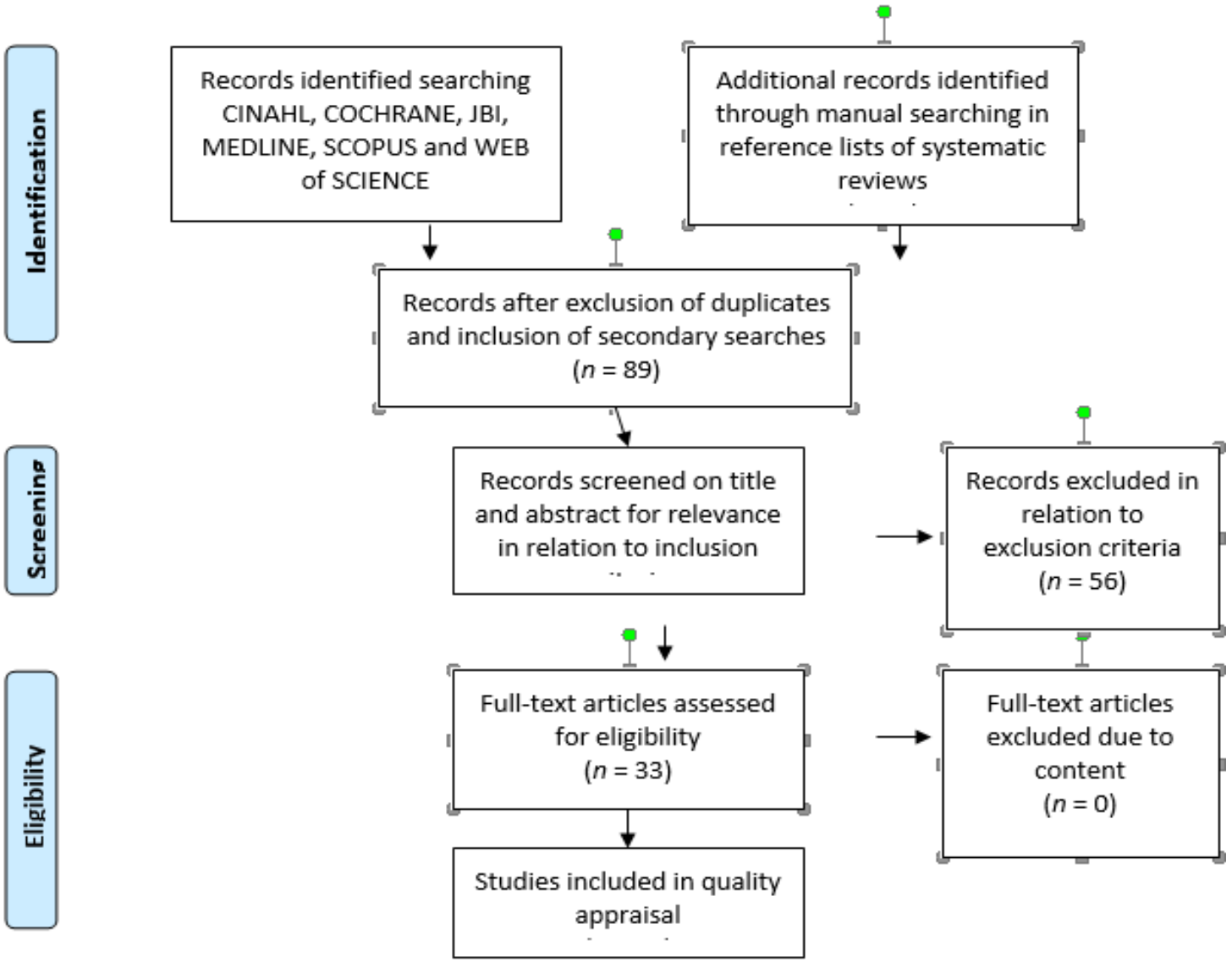
key terms ‘Nursing’, ‘intentional rounding’ OR ‘hourly rounding’ OR ‘patients rounds

CINAHL, MEDLINE, COCHRANE, SCOPUS

Inclusion criteria

Studies involving adults in acute care

Literature search



Included studies

- 13 quantitative studies
- 4 mixed method studies
- 4 qualitative studies

- Critical appraisal checklists from the JBI Meta-Analysis of Statistical Assessment and Review Instrument (JBI-MAStARI).
- Qualitative Appraisal Review Instrument (QARI)
- Data extraction - study characteristics and outcomes were tabulated

Study characteristics

- Studies were undertaken in the USA (n=12), Australia (n=5), Iran (n=1) UK (n=1) and Saudi Arabia (n=1).
- A variety of clinical settings
- Overall weak study designs
- A variety of designs
  - pre-test post-test,
  - separate samples design
  - one-group, repeated measures and separate samples design
- Most compared IR with usual care

Study characteristics

- Sample ranged from 4,418 to 100
- Five studies were unclear or did not report sample size
- Duration of data collection ranged from 2-4 weeks to 24 months
- IR interventions varied (hourly, two hourly, week days only, 7am to 10pm)
- Difference health care staff (RN, LPN, Nursing Assistant)

Outcomes

- Falls prevention
- Patient satisfaction and nurse responsiveness
- Call bell use

- Nurses' satisfaction, attitude and compliance with IR protocols

Falls prevention

- Reported in 11 studies
- 6 reported statistically significant reduction in falls (Brosey and March 2015, 7.02 per 1000 pd to 3.18 over 4 months
- Dearmon et al. 2013, Goldsack et al. 2015, Meade et al. 2006, Morgan et al 2016, 50% reduction in patient falls on the active ward Saleh et al. 2011
- 5 reported a reduction in falls (Cann and Gardner 2012, Krepper et al. 2014, Olrich et al. 2012, Tucker et al. 2012, Woodard 2009).

- No standard definition of patient falls
- Fall reporting mechanisms varied

Patient satisfaction and nurse responsiveness

- 10 studies reported on IR patient satisfaction with nurse responsiveness
- 4 statistically significant increase in patient satisfaction (Krepper et al. 2014, Meade et al. 2006, Negarandeh et al. 2014, Tea et al. 2008 – series of questions asked by ward manager
- All reported an initial increase in patient satisfaction scores following the implementation of IR however Krepper et al. (2014) noted that initial differences were not maintained at the three month post implementation period
- Other studies did not report sufficient data or no increase was observed

Call bell use

- Call bell use seen as an indicator of how well patient needs were being proactively anticipated

- Cann and Gardner (2012) and Meade et al. (2006) and reported a significant reduction from 13,216 to 8,315 instances of call bell use in hourly rounding over a four week post implementation period.

- However Krepper et al. (2014) reporting on data collected over a six month period, found that call bell use increased significantly in both the study and control groups.

Nurses attitudes and compliance with IR

- Nurses perceived mandated IR protocols as burdensome and unnecessary (Deitrick et al. 2012, Neville 2012, Walker et al. 2015)
- Reduced their sense of professional autonomy
- Limited time available to respond appropriately to high acuity, confused or dying patients (Flowers et al. 2016, Neville 2012, Tucker et al. 2012).
- Low compliance with IR protocols were reported
- Lack of staff ownership and lack of clarity about the purpose of IR (Deitrick et al. 2012, Tucker et al. 2012)
- difficulty integrating IR into nurses existing workflow (Deitrick et al. 2012, Harrington et al. 2013, Rondinelli 2012).

Conclusions

- Mixed evidence in relation to the impact of IR on patient safety
- Some support for improvement in falls prevention, reduction in call bell use and increased patient satisfaction
- Limitations in study designs has led to weak evidence for the outcomes identified.
- Majority of studies conducted in USA or Australia with limited evidence of transferability
- IR protocols force the allocation of time spent with patients through rounding rather than on the basis of assessment and clinical need.

Conclusions effectiveness and sustainability

- IR and its fit with the implementation setting is as important as the intervention (Morgan et al. 2016).
- Meaningful engagement of frontline staff from the outset
- More likely to be effective and accepted by frontline staff, when developed in response to an identified patient safety concern,
- Measurement of intended and unintended outcomes as evidence of the impact of IR on the safety and quality of care
- Overall our findings identify the need for more robust studies to explore the impact of IR on patient and staff outcomes.