A systematic review of interventions targeting the de-implementation of patient safety practices in hospital settings

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Background: Patient's safety practices are sometimes implemented with minimal to no supporting evidence, and over time may contribute to "safety clutter". Safety clutter refers to the accumulation of safety practices, protocols and procedures that intend to improve safety but do not contribute to operational safety (Rea et al., 2018). This adds burdens to clinical activity that can also negatively impact patient outcomes, leading to an urgent need to develop strategies for the de-implementation of outdated, ineffective or unnecessary patient safety practices. Understanding behavioral and contextual factors that shape patient safety practice de-implementation strategies helps provide guidance for developing successful interventions that aid in reducing safety clutter, making care delivery safer and improving patient outcomes.

Objectives: To identify the components of interventions used to de-implement patient safety practices and identify effective de-implementation strategies. What theories and frameworks have been used to develop the interventions? What are most prevalent behavioural concepts used in the interventions? Are there differences in factors influencing de-implementation between professional groups? What equity measures were considered in developing and evaluating de-implementation interventions? Are there any unintended outcomes?

Methods: Searching was conducted across 5 databases using terms related to patient safety and de-implementation: PsycHINFO, EMBASE, MEDLINE, CINAHL, Dimensions and Prospero. 14,047 articles were retrieved. Three reviewers independently screened abstracts and full texts; 29 papers were included.

Results (Preliminary): 1.The most commonly de-implemented safety practices were those recommended for reduction in national guidelines, such as restraint, seclusion and continuous cardiac monitoring. Fewer studies explored practices like removing elements of falls risk assessments.
2.Most studies did not employ a theoretical framework to guide de-implementation or interventions development, except for reducing restraints in mental health settings, which utilised a Huckshorns six core strategies for restraint reduction.
3.The most common behavioural concepts were instruction on how to perform a behaviour and feedback on behaviour. Others included restructuring the physical environment and information about consequences.
4.Most studies reported a reduction in the targeted practice. Unintended consequences included increases in length of stay and in self-discharge against medical advice.
5.Most studies collected demographic data, but only three considered inequities in intervention design or outcomes. One study identified 'the immigrant condition' as a restraint risk and used pictograms to address language barriers.

Conclusion: De-implementation of outdated safety practices requires theory driven strategies and careful consideration of behavioural and contextual factors to minimise safety impact and unintended outcomes.

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Background:

Some patient safety practices lack evidence and over time create "safety clutter."

This can add burdens to clinical activity and negatively impact patient outcomes.

There is an urgent need to develop strategies for the de-implementation of low-value patient safety practices.

Aims and questions:

To identify the components of interventions used to de-implement patient safety practices and identify effective de-implementation strategies.

Method

Patient safety and de-implementation terms were used to search 5 databases and de-implementation: PsycHINFO, EMBASE, MEDLINE, CINAHL, and google scholar.

18,358 articles were retrieved. Three reviewers independently screened abstracts and full texts; 27 papers were included.

Data on study and intervention details, outcomes, behavior change strategies and equity factors were extracted in Excel and analyzed via narrative synthesis.

Results

Thirteen studies examined the reduction of restraints and seclusion, five addressed the de-implementation of monitoring telemetry, two evaluated the removal of elements from falls risk assessments, and one investigated the restriction of prophylactic antibiotics.

Quality improvement publications for de-implementing patient safety practices lacking primary research were included: four on reducing enhanced observation, one on de-implementing medication double-checking, and one on gastric residual volume monitoring.

Preliminary findings

The most commonly de-implemented safety practices were those recommended for reduction in national guidelines, such as restraint, seclusion.

Most studies reported a reduction in the targeted practice. Unintended consequences of de-implementation included increases in length of stay and self-discharge against medical advice.

Most studies collected demographic data, but only three considered inequities in intervention design or outcomes evaluation.

Conclusion

There is limited evidence of systematic, robust efforts to identify and de-implement low-value safety practices. Equity considerations are largely absent from the design and evaluation of interventions to de-implement patient safety practices

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