INTEGRATED INTERVENTIONS TO REDUCE PRESSURE ON ACUTE HOSPITALS: A SYSTEMATIC UMBRELLA REVIEW

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Objectives The objectives of this review were to examine integrated health system interventions that have the potential to reduce pressure on acute hospitals. The outcomes that were included for assessing reduced pressure were unplanned admissions to hospital, readmissions, length of stay in hospital, emergency department visits, and healthcare costs.

Method An initial scoping search was conducted in order to frame the parameters of the review. Following the scoping search, an information specialist developed a targeted search strategy using MeSH terms and keywords for the outcomes of interest. Two databases, MEDLINE and the Cochrane Database of Systematic Reviews, were included in the search. Pairs of authors screened, quality assessed, and extracted data. Heterogeneity prevented pooled analysis of the included reviews. Instead, we extracted the findings related to health system outcomes from each review and described the effectiveness for each intervention by outcome measured and by population, as well as summarising the findings of the reviews for each intervention. We calculated the degree of overlap of primary studies in our included reviews using the corrected covered area measure.

Results This review included 36 published systematic reviews and one umbrella review. Our analysis identified seven complex integrated interventions targeting adults with chronic diseases, eight interventions focusing on medical and surgical conditions among adults, and three interventions for older people. We identified a total of 13 integrated interventions between the hospital and the community aiming to reduce pressure on acute hospitals. Seven interventions focused on people with chronic diseases. Among these, self-management demonstrated good effectiveness, and the other six were moderately effective (discharge management, chronic care model, complex interventions, multidisciplinary teams, hospital at home, and interactive telemedicine). Four interventions targeting acute conditions were moderately effective (discharge management, medication management, hospital at home, and primary care near emergency department), and four emergency department interventions had low effectiveness. Three interventions focusing on older people also had low effectiveness (discharge management, case management, and specialised multidisciplinary rehabilitation for hip fracture).

Conclusions The findings indicate that there are a number of promising interventions that reduce pressure on acute hospitals for people with chronic diseases. There are also some promising interventions that reduce pressure on acute hospitals for people with medical and surgical conditions. There are currently no promising interventions that reduce pressure on acute hospitals for older people. Integrated interventions are multi-component complex interventions, and the interrelationships between these components are rarely described in the literature. Furthermore, the delivery of interventions requires a complex chain of action, delivered in health systems that combine an array of pre-existing interventions and contextual contingencies. These intervention pathways were rarely explored in the studies we reviewed. Therefore, we were unable to identify why these interventions were promising for only some patients under certain conditions. These limitations make it very difficult to translate research on integrated interventions to reduce pressure on acute hospitals into policy and practice.

THE RISK OF IMPRECISE TERMINOLOGY: INCONGRUENT RESULTS OF CLINICAL TRIALS AND INCONGRUENT RECOMMENDATIONS IN CLINICAL GUIDELINES

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Objectives The aim of our study is to describe the congruence in the terminology used to describe both design and outcomes of clinical trials. Terminology affects the endorsement of commonly accepted clinical experience, and of poorly defined and undifferentiated interpretations of efficacy and effectiveness. Further, choice of terms may explain the results of our congruence analysis of clinical guidelines. A review of recommendations based on 330 scenarios from 24 international guidelines for the same scenario about treatment of malignant diseases found congruence in only 15% of the corresponding recommendations.

Method We analysed five corresponding pairs of terms recommended in six reviews articles on the reporting the outcomes of clinical trials. Two databases, MEDLINE and the Cochrane Database of Systematic Reviews, were included in the search. Pairs of authors screened, quality assessed, and extracted data. Heterogeneity prevented pooled analysis of the included reviews. Instead, we extracted the findings related to health system outcomes from each review and described the effectiveness for each intervention by outcome measured and by population, as well as summarising the findings of the reviews for each intervention. We calculated the degree of overlap of primary studies in our included reviews using the corrected covered area measure.

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