

Title HYBRID MATTRESS FOR PREVENTION AND TREATMENT OF PRESSURE ULCER

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Aim

To review evidence on the effectiveness, safety, cost-effectiveness and organizational aspect of Hybrid Mattress for prevention and treatment of pressure ulcer.

Conclusions and results

This review includes three articles: a RCT, a cross sectional study and a case report. The studies retrieved and included in this review were conducted using the powered hybrid mattress. No retrievable evidence on non-powered hybrid mattress.

The review showed that there was limited retrievable evidence to suggest the effectiveness of hybrid mattress when used for treatment and prevention of pressure ulcer. The evidence seems to suggest the benefit of hybrid mattress in terms of improving or healing of pressure ulcer specifically for Grade I and II pressure ulcer.

No significant adverse event was reported among the pressure ulcer patients when using hybrid mattress. However, there was no retrieval evidence from the United States Food and Drug Administration (USFDA) and CE mark for this technology.

There was no retrievable evidence on the cost-effectiveness of this technology and the price per piece of powered hybrid mattress is about RM 10,000.00

From the organizational aspect, the used of hybrid mattress showed reduced in time for patients handling by nurses and patients were comfortable when lying on this hybrid mattress.

Recommendations (if any)

Based on the above review, the use of hybrid mattress in prevention and treatment of pressure ulcer is recommended for research purpose to provide more quality evidence.

Methods

Electronic databases were searched, which included PubMed, Medline, Journal @ Ovid full text via OVID, OVID EBM Reviews - Cochrane central register of controlled trials, EBM Reviews - Cochrane database of systematic review, EBM Reviews-Cochrane Central Register of Controlled Trials, EBM Reviews-Database of Abstracts of Review of Effects, EBM Reviews-Health Technology Assessment, NHS

economic evaluation database - Google search engine. In addition, a cross-referencing of the articles retrieved was also carried out accordingly to the topic. Relevant articles were critically appraised and evidence graded using US/Canadian Preventive Services Task Force.

Further research/reviews required

Further research on this technology is required.

Written by

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