Better search filter performance for articles included after appraisals of quality and transferability

A comparison of two search filters for economic evaluations: The CADTH Narrow vs the NHS EED search filter

Objective: To evaluate if the CADTH narrow economic search filter could produce a similar sensitivity to the NHS EED search filter while achieving a lower number needed to read (NNR) when searching for economic evaluations in the Ovid MEDLINE database.

Result 1 Sensitivity of economic search filters in Ovid MEDLINE.

Filter	Sensitivity GS 1	Sensitivity GS 2
NHS EED	98 %	98 %
CADTH narrow	79 %	91 %

GS 1 = Gold standard based on relevance; **GS 2** = Gold standard based on assessment of quality and transferability.

Result 2 NNR of economic search filters in Ovid MEDLINE.

Filter	NNR GS 1	NNR GS 2	Hits in Ovid MEDLINE*
NHS EED	73	286	1 174 205
CADTH narrow	16	56	213 006

* Date of search: 30 June 2023

Methods

- We identified references of economic evaluations from a sample of 13 systematic reviews conducted by SBU
- The references that met the inclusion criteria within each review were used to generate the gold standard set (GS 1) for Ovid MEDLINE (n=126)
- We also created a subset of the gold standard (GS 2) which only consisted of references that were included in the final analyses of the systematic reviews after appraisals of quality and transferability to the Swedish setting (n=46)
- NNR was then calculated in 4 out of the 13 systematic reviews using existing search strategies in combination with the evaluated filters.

References

- Economic Narrow MEDLINE, Embase. In: CADTH Search Filters Database. Ottawa: CADTH; 2023: https://searchfilters.cadth.ca/link/20. Accessed: 2023-06-30
- 2. NHS EED MEDLINE using OvidSP. York: Centre for Reviews and Dissemination. Available from: http://www.crd.york.ac.uk/crdweb/searchstrategies.asp. Accessed: 2023-06-30

Limitation: Small gold standard mainly based on searches with the NHS EED search filter.



