
Mindfulness-based cognitive therapy to prevent relapse in recurrent depression

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Record Status

This is a critical abstract of an economic evaluation that meets the criteria for inclusion on NHS EED. Each abstract contains a brief summary of the methods, the results and conclusions followed by a detailed critical assessment on the reliability of the study and the conclusions drawn.

CRD summary

The objective was to compare mindfulness-based cognitive therapy (MBCT) with maintenance antidepressant medication, in terms of their efficacy and cost effectiveness, for patients at risk of depressive relapse. The authors concluded that MBCT might be justified by improvements in the proportion of patients who relapsed, but only if the willingness to pay for health benefits exceeded \$1,000. The study was well conducted and reported, and the results are reliable.

Type of economic evaluation

Cost-effectiveness analysis

Study objective

The objective was to compare mindfulness-based cognitive therapy (MBCT) with maintenance antidepressant medication (ADM) in relation to efficacy and cost effectiveness for patients at risk of depressive relapse.

Interventions

Maintenance ADM was compared with MBCT with maintenance ADM and support for reducing and discontinuing medication. MBCT was designed to train patients to be more aware of their bodily sensations, thoughts, and feelings associated with depressive relapse. The training consisted of eight two-hour sessions over eight consecutive weeks and four follow-up sessions over the following year. Primary care physicians met the patients regularly to review their medication. Medication adherence was monitored through patients' self-report at follow-ups every three months, practice databases, and the Morisky Medication Adherence Scale.

Location/setting

UK/primary care.

Methods

Analytical approach:

This economic evaluation was based on a single clinical study, with a time horizon of 15 months. The authors stated that a societal perspective was adopted.

Effectiveness data:

The clinical data were derived from a randomised controlled trial (RCT). The sample included 123 patients, with 61 randomised to the MBCT group and 62 to the ADM group. The primary analysis was carried out on an intention-to-treat basis. The primary clinical outcome was the time from randomisation to depressive relapse or recurrence and a survival analysis was conducted to derive these data. The other clinical outcome measures included severity or duration of relapses or recurrences, severity of residual depressive symptoms, number of co-morbid psychiatric diagnoses, and quality of life.

Monetary benefit and utility valuations:

None.

Measure of benefit:

The benefit measures were the cases of prevented relapse and depression free days.

Cost data:

The economic analysis included the costs associated with hospital in-patient, out-patient and emergency room visits, community health and social services, and productivity losses due to illness. The resource use data were collected through interviews with patients in the RCT at three-month intervals up to 15 months post-randomisation. The cost of MBCT group sessions was assessed directly using data from the RCT. National UK unit costs were applied to all other health and social services. Productivity losses were derived using the human capital approach. All costs were in US dollars (\$) using the World Bank purchasing power parity exchange rate and the price year was 2006.

Analysis of uncertainty:

A bootstrapping approach was used to address the issue of uncertainty around the incremental cost-effectiveness ratio (ICER), and to generate cost-effectiveness acceptability curves.

Results

Over the 15-month follow-up, the relapse or recurrence rates were 47% for MBCT and 60% for ADM (hazard ratio: 0.63; 95% confidence interval, CI: 0.39 to 1.04). The MBCT group reported significantly fewer residual depressive symptoms (Hamilton Rating Scale for Depression: 7.05 for MBCT and 8.69 for ADM, and Beck Depression Inventory II: 12.61 for MBCT and 17.02 for ADM). A better quality of life, measured using the World Health Organization Quality of Life assessment scale, was reported with MBCT (23.97 in the physical domain) than with maintenance ADM (22.93). The rates of ADM use in the MBCT group were significantly reduced, with 75% completely discontinuing their medication in the first six months of follow-up.

There was no significant difference in annual costs per patient for MBCT (\$2,767) compared with ADM (\$2,340; 95% confidence interval, CI: -852 to 1,705; $p=0.788$).

From a societal perspective, the ICER was \$962 per relapse or recurrence prevented and \$50 per depression free day. For the health service costs only, the ICER was \$439 per relapse or recurrence prevented and \$23 per depression free day.

The cost-effectiveness acceptability curve showed that MBCT was cost-effective with a higher probability than ADM, when the societal willingness to pay was over \$1,000.

Authors' conclusions

The authors concluded that MBCT might be justified in terms of improvements in the proportion of patients who relapsed, but only if the willingness to pay for health benefits exceeded \$1,000.

CRD commentary

Interventions:

The interventions were adequately described. The authors provided a justification for their selection of the comparators, which was that the new intervention was compared with the usual care in the authors' setting.

Effectiveness/benefits:

The clinical data were derived from a RCT, the methods and findings of which were reported well. RCTs are usually regarded as a robust and valid source of data due to the strengths of their design and this appeared to be a well-conducted RCT. Although the authors reported the quality of life, the benefit measures were disease specific. These measures will not permit a direct comparison with the benefits of other health care interventions.

Costs:

The cost analysis was consistent with the perspective and a breakdown of the cost items was provided. The resource use and cost estimates were relevant to the study population and the resource use measurement methods should ensure accurate estimates. The sources of costs were reported and were appropriate for the UK. Other details of the cost analysis, such as the price year and the use of statistical analyses, were reported.

Analysis and results:

The costs and benefits were combined appropriately using an incremental approach. The issue of uncertainty was satisfactorily addressed in the bootstrapping analysis. The findings were clearly presented and the authors discussed the

limitations of their study.

Concluding remarks:

: The study was well conducted and reported, and the results are reliable.

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Bibliographic details

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Other publications of related interest

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Indexing Status

Subject indexing assigned by NLM

MeSH

Adult; Aged; Antidepressive Agents /therapeutic use; Awareness; Cognitive Therapy /methods; Depressive Disorder, Major /diagnosis /drug therapy /therapy; Diagnostic and Statistical Manual of Mental Disorders; Female; Humans; Male; Middle Aged; Patient Compliance /statistics & numerical data; Secondary Prevention; Young Adult

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