Cost–Utility of 2 Maintenance Treatments for Older Adults With Depression Who Responded to a Course of Electroconvulsive Therapy: Results From a Decision Analytic Model

Mohamed Aziz, MD, MS1, Ann M Mehringer, MS2, Ellen Mozurkewich, MD2, Gihan N Razik, MD3

Objective: The prevalence of major depressive disorder (MDD) in community-dwelling elderly populations is 1% to 3%. After initial treatment of the acute phase of depression, only about 25% to 30% of elderly patients remain well after 1 to 3 years of follow-up. Previous studies suggested that patients who received maintenance electroconvulsive therapy (MECT) demonstrated lower relapse rates, a better subjective sense of well-being, and lower health care costs at 12-month follow-up. This study provides a cost–utility analysis of 2 maintenance treatments for recurrent depression in elderly patients.

Method: We used a Markov decision model to compare maintenance pharmacotherapy (MPT) with MECT in a theoretical cohort of elderly individuals with MDD who responded to an initial course of ECT. We estimated total costs and total quality-adjusted life years (QALYs) for each strategy as well as the cost per QALY.

Results: The model produced a cost per patient of $436,102 for MPT and $281,356 for MECT. The MPT strategy yielded 7.55 QALYs and the MECT strategy yielded 11.43 QALYs. Therefore, MPT cost $57,762 per QALY and MECT cost $24,616 per QALY.

Conclusion: Our model suggests that MECT may be more cost-effective than MPT in the maintenance treatment of older adults with depression who have responded to a course of acute ECT.


Information on author affiliations appears at the end of the article.

Clinical Implication
• MECT in elderly patients with depression is a useful and cost-effective intervention.

Limitation
• The findings apply only to elderly patients with depression who responded to a course of acute ECT.

Key Words: depression in elderly, maintenance electroconvulsive therapy, decision analytic models

The prevalence of MDD in community-dwelling elderly populations is 1% to 3%, and an additional 8% to 16% of elderly persons have clinically significant depressive symptoms or subsyndromal symptoms (1,2). The prevalence of MDD among elderly hospitalized patients is 5% to 13%; in nursing home residents, it is 12% to 16%; and in residents of long-term care facilities, it is about 50% (3). In 1991, Kupfer reported that 50% of patients treated for a first episode of MDD will have a second episode. Following a second episode, the risk of a third episode is likely in 80% to 90% of patients (4).

Depressive symptoms are associated with increased risk of disability and impaired psychosocial functioning (5). Elderly patients with depressive symptoms have higher mortality...
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The pharmacotherapy for elderly patients with depression is particularly challenging for many reasons. First, hepatic and renal drug and metabolite clearance may decrease. Second, the presence of medical illness and administration of multiple medications may interfere with response to medications. Conversely, the estimates of medication noncompliance in elderly patients with depression are similar to those reported for adult patients with depression, ranging from 40% to 75% (10). Third, although elderly patients respond well to treatment of the acute phase of depression, only about 25% to 30% remain well after 1 to 3 years of follow-up (11). Thus the limitations of optimal pharmacotherapy have become more evident in recent years, and the need to prevent relapses and recurrences in patients with depression and suicidal tendencies has become more urgent, rekindling interest in ECT.

ECT is a highly effective treatment for elderly patients with MDD who are medication-resistant or medication-intolerant. Significant antidepressant response has been demonstrated after few treatments (12). Continuation ECT is a time-limited course of treatments for 6 months or less used for relapse prevention, whereas maintenance ECT has no fixed endpoint and is used to prevent recurrences, as defined by the American Psychiatric Association in its 1990 report (13).

After 10 weeks without ECT, however, 80% of patients will relapse (14). In a recent randomized controlled study, Sackeim and colleagues addressed the effect of post-ECT relapse. They found that 84% of patients relapsed after ECT while receiving a placebo, compared with 60% receiving nortriptyline maintenance treatment and 39% receiving nortriptyline and lithium maintenance treatment (15). Given the good response to initial ECT and the subsequent high rate of relapse, considerable interest has arisen in using MECT as a prophylactic treatment for elderly depression patients.

In 2001, the American Psychiatric Association Task Force on ECT delivered its special report, in which it recognized the role of MECT in the management of patients’ post-ECT course (13). Stephens and colleagues indicated that about 80% of patients who responded to an initial course of ECT remained well during periods of MECT (16). Jaffe and associates used MECT successfully to treat 32 elderly patients with MDD, obtaining a response rate of 69% (17). In patients who failed to respond to adequate pharmacotherapy before ECT, pharmacotherapy after ECT had no significant impact on relapse rates (64% vs 53%) (18). Schwartz and colleagues found a 67% drop in the rehospitalization rate for patients receiving MECT, compared with rates of hospitalization before the initial ECT treatment (19). Clarke and associates reported a sixfold decrease in the hospitalization rate of patients completing a 5-month MECT course, compared with patients who failed to complete the protocol (20). A study based on a small sample revealed that MECT reduced the cost of depression by more than 50% because of the decreased need for acute hospitalizations (21). In another study comparing 6-month outcomes among depression patients receiving maintenance medications or MECT, those who received MECT demonstrated lower relapse rates (11% vs 67%), better subjective and objective senses of well-being, and lower health care costs at 12-month follow-up (22).

Our study aimed to more closely examine the costs and outcomes of 2 maintenance therapies in a theoretical population of elderly individuals with recurrent depression who responded to acute ECT. To do this, we used decision analysis software to simulate a direct comparison of MPT with MECT.

### Methods

We constructed a Markov decision analytic model using DATA 3.5 (23) to simulate and compare 2 cohorts of patients, each in a separate treatment arm—either MPT or MECT. A Markov model is a state-transition model in which the transition probabilities depend only on the current state (and not, for example, on the previous state or the path by which the state was entered) (24). In other words, a Markov model captures the dynamics of the changes in disease probabilities over time.

We did the simulation as a cost–utility analysis, a particular type of cost-effectiveness analysis where adjustments for the value assigned to health-related quality of life are built into the calculation. For example, living for 5 years with a quality of...
life assigned a utility score of 0.4 will result in an outcome of 2 QALYs, which is equal to living 2 years in perfect health. For many reasons cost–utility analysis is an extremely useful method for clarifying choices between different treatment alternatives. First, it captures the subjective sense of well-being experienced by the patient as well as the objective evaluation of well-being as assessed by others (these qualities are called “utilities”). Second, cost–utility analysis takes into account the number of years the patient will continue experiencing that quality of life. Third, it standardizes the outcome so that comparing different therapeutic interventions becomes feasible. These utility standards, most often expressed as QALYs, combine measures of quality of life with a quantitative measure of life years. Although utilities are more subjective and thus more difficult to measure than costs, standards have been developed over the last several years allowing direct comparisons across diseases and across studies.

Model Description
Our analysis concerns 2 hypothetical cohorts of elderly patients (aged 65 years) suffering from MDD. To enter into the model, subjects must have experienced a relapse of MDD symptoms and responded to an initial course of ECT. We chose these criteria because this is the population (that is, those experiencing any MDD episode other than the first one ever) that fulfills the American Psychiatric Association’s criteria of needing long-term maintenance therapy for MDD (13). Several assumptions were made to allow modelling the direct comparison of the 2 treatments of interest: each cohort of patients enters either the MPT arm or the MECT treatment arm only, does not cross over into the other therapy, and is followed for the remainder of life.

We constructed a Markov model to track health status, utilities, and costs for each patient as they change and accrue over time. The model cycles every 6 months to simulate the average length of an MDD episode. Possible health states for patients in each cycle include these: wellness (full remission of depressive symptoms), partial depression (only partial remission of depressive symptoms or subsyndromal depression), depression (no response to treatment), death by suicide, or death by another cause.

We included partial depression in the model because several studies have established partial depression as a subthreshold form of mood disorder. As such, it is associated with significant morbidity, social dysfunction, impairment in occupational activities, and increased suicidal risk of enough clinical significance to be included in the appendix of the DSM-IV (2). For each 6-month cycle in the MPT treatment arm, patients remaining alive continue the medication regimen. Patients in the MECT treatment arm who do not die during a cycle remain on MECT. Patients in either treatment arm who experience a recurrence of MDD cycle to initial ECT treatment and then return to the treatment arm from which they
began. Our model assumes that all subjects will respond to initial ECT treatment, that no patient will commit suicide during the first cycle, and that patients in full remission do not commit suicide. The Markov model continues to cycle through all probabilities and health states until all patients in both cohorts have died. Costs and utilities accrued during the simulation are then totalled and compared. Figure 1 depicts a simplified version of the decision analysis model.

Data

Three types of data were required to model this cost–utility analysis: health utilities or qualities; costs, both direct and indirect; and probabilities of response, relapse, and recurrence. We entered numbers that we derived from recent literature into the model for utilities, costs, and probabilities. We used the gross approach to calculate cost by assigning a national average figure such as the Medicare-derived reimbursement rate. For example, we used the DRG reimbursement rate for the hospitalization cost of MDD, the RVU reimbursement rate for physician cost, and the APC reimbursement rate for the cost of hospital technical support for outpatient services. Utilities and costs were from the societal perspective (incorporating values for patients, caregivers, the health system, and the community) and were discounted at an annual rate of 3% to allow for greater value of immediate benefits. As is typical with a cost–utility analysis, the results were expressed as a ratio of US dollars per QALY. We then performed a sensitivity analysis, entering higher and lower values of probabilities, costs, and utilities one at a time to determine whether the outcomes changed according to the chosen values of the variables entered into the model.

Utilities

Utilities were scaled from 0 to 1, with 0 being equal to death and 1 being equal to perfect physical and mental health. Because the data in the literature were scarce, we made several assumptions in our model. We tested the estimates we chose from the published literature by varying estimates of utility over a wide range in the sensitivity analysis. Utility scores entered into the model as well as ranges used in the sensitivity analysis are shown in Table 1.

Depression has far-reaching effects on a person’s entire being and way of functioning. Because of this, a comparison of treatments must include measures of disability, physical health, functioning, and quality of life to best determine the treatment having the most positive effect on a patient’s overall functioning. The 1995 NIH/MacArthur Foundation Workshop Report emphasized the fact that assessment of outcomes in late-life depression should include more than measurement of depressive symptoms (25). As recommended by this report, we used subjective reports of life satisfaction and self-rated depression for our utility measures.

The utilities for an acute episode of depression (untreated) were assigned a mean utility score of 0.43 (26,27). In our model, we subtracted 0.02 from the above 0.43 score to account for medication side effects (25). The utility score for full remission of depressive symptoms during pharmacotherapy was calculated to be 0.75 for MPT (25,26,28).

As mentioned earlier, we felt it was important to include subsyndromal depression as one of the health states in our model. DasGupta also noted comparable disabilities in patients with full depression and partial depression (10). We calculated the utility score for partial remission of depressive symptoms during pharmacotherapy to be 0.55 (10,28,29). Because we based this estimate on sparse literature results, we set the range to test this score in our sensitivity analysis from 0.30 (the lowest range value for no remission) to 0.95 (the highest range value for full remission).

Finally, we required utility scores for the comparable health states in the MECT treatment arm. In one study directly comparing response to ECT with pharmacologic treatment, Sackeim observed that ECT was more effective than medication in the treatment of MDD because of the much more rapid and higher quality response achieved (30). Our best source for utility estimates for MECT was a study done by McDonald and others (22). In this study, elderly depression patients who responded to an initial course of ECT continued on treatment either with medication or with MECT. Before and after treatment, both groups completed the MOSF—a self-report scale measuring physical functioning, bodily pain, role functioning, general health, social functioning, and mental health. The group treated with MECT improved 20% more on average than

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**Table 1 Utility scores used for different transition states in the model**

<table>
<thead>
<tr>
<th>Utilities</th>
<th>Mean</th>
<th>Range</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Pharmacotherapy</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Depression</td>
<td>0.43²</td>
<td>0.20 to 0.80</td>
</tr>
<tr>
<td>Partial depression</td>
<td>0.55¹</td>
<td>0.40 to 0.90</td>
</tr>
<tr>
<td>Well</td>
<td>0.75³</td>
<td>0.50 to 1.00</td>
</tr>
<tr>
<td><strong>ECT</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Depression</td>
<td>0.52²</td>
<td>0.30 to 0.80</td>
</tr>
<tr>
<td>Partial depression</td>
<td>0.66¹</td>
<td>0.40 to 0.90</td>
</tr>
<tr>
<td>Well</td>
<td>0.90³</td>
<td>0.50 to 1.00</td>
</tr>
<tr>
<td><strong>Death</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Suicide</td>
<td>0</td>
<td>—</td>
</tr>
<tr>
<td>Death by other cause</td>
<td>0</td>
<td>—</td>
</tr>
</tbody>
</table>

¹Scores range from 0 (dead) to 1 (perfect health).
²Data are from McDonald and others (22).
³Data are from Mazumdar and others (27).
⁴Data are from Judd and others (49).
⁵Data are from Hatziandreu and others (25).

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Data are from McDonald and others (22).

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Because we based this estimate on sparse literature results, we set the range to test this score in our sensitivity analysis from 0.30 (the lowest range value for no remission) to 0.95 (the highest range value for full remission).

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the group treated with medication. Based on this information, we calculated utility scores for MECT by multiplying each MPT utility score by 0.2 (or 20%) and adding this product to each health state’s value. Table 1 shows all utility estimates.

**Costs**

The NIMH recommends including a wide range of services to assess the costs of depression and its treatment (31). Such services include clinician time, medication, laboratory tests, hospital costs, and outpatient visits. We used gross costing, which estimates the cost of an event (for example, a hospitalization for an episode of MDD) by assigning an average figure such as the Medicare-derived reimbursement rate. We used DRG tables for facility costs of hospital services, RVU tables for physician charges for inpatient services and outpatient visits, and APC tables for the facility component of outpatient procedures. The advantages of gross costing are its simplicity, practicality, and (if data are obtained broadly) robustness to geographic, institutional, and other sources of variation (32). It is also essential to include lost wages in some manner. Since the population used in this model included only patients aged 65 years, many were likely no longer in the workforce. As suggested by Kamlet and colleagues, we used lost-wage estimates when accounting for time burdens and emotional costs (that is, the value of lost leisure time and activities) (33). We also included wages lost by caregivers.

Table 2 shows the item costs used in the analysis and the sources for each. The actual cost entered into the model for each health state depended on the average number of days of hospitalization used, the cost of medication or MECT, the average number of outpatient visits, and the average number of home health care visits over a 6-month period. Using figures from Koenig and Kuchibhatla (34), we calculated the following monthly days of hospitalization: 1.7 for patients with MDD, 1.8 for patients with partial depression, and 0.9 for those in full remission. We calculated that patients with depression, with partial depression, and without depression made 1.9, 1.4, and 1.1 visits to a physician monthly, respectively. Likewise, the number of monthly home health visits was estimated at 1.1, 1.5, and 0.6. Patients on MECT received 2 ECT treatments monthly on an outpatient basis. In addition to hospital costs, the cost of ECT included the professional costs of a psychiatrist and an anesthesiologist. Patients with a recurrence of MDD required a repeat course of initial ECT, which included costs for an additional 10 days of hospitalization and 10 sessions of ECT. Although patients themselves do not incur a cost from suicide, our model reflects the societal perspective and therefore includes the postmortem medical examination or autopsy costs incurred by society when a patient commits suicide. We also included in the model the cost of deaths from other sources (that is, average funeral costs).

**Probabilities**

The literature on the efficacy of pharmacotherapy for depression in the elderly presents a wide range of responses, most likely because of the large number of antidepressants used and the various ways outcomes were measured. The reports on MECT efficacy are less abundant. To determine the probabilities used in our decision analysis model, we turned again to the study by McDonald and colleagues (22). This study was the most directly relevant to our model because the authors studied the same population and compared the 2 treatment arms that we simulated in our model. Although the number of patients they studied was small, their results were analyzed as intention-to-treat (and some patients did cross over or drop out) and can thus be considered fairly conservative. Relapse rates at 6 months were 67% for the MPT group and 11% for the MECT group. Further support for these percentages can be found in the literature (16,35,36).

Of patients considered to have responded to pharmacotherapy, 23% show subsyndromal symptoms of depression (37). Thus, we further divided our response rate probability of 33% to 25% for full remission and 8% for partial remission in the pharmacotherapy treatment arm (Table 3). For our model, we took all-cause mortality rates from the 1997 life tables and adjusted for age each 6 months that the cohorts cycled through the model (38). We further divided this all-cause mortality into deaths from suicide and deaths from other causes. Some studies have suggested that elderly persons with depression are more likely to die than elderly persons without depression. In one report, the mortality rate for subjects suffering from depression did not differ significantly from that for those suffering from subsyndromal depression (39); however, in other reports it was approximately 2 times higher than the rate for those not suffering from depression (11,40,41). For our model, we based the 0.25% estimated probability of death from suicide on the suicide rate per episode reported by Kamlet and colleagues (33). Then we estimated the probability of death from other causes as the all-cause mortality rate minus the probability of death from suicide.

**Results**

Seventy-two 6-month cycles were required to bring about the death of all subjects. Our model estimated the average lifetime cost associated with MPT to be $436 102 per patient and the average lifetime cost of MECT to be $281 356. The increased cost of MPT, compared with that of MECT, appeared to be caused by a high probability of recurrent depression with MPT and the assumption that these subjects would then require a full course of acute ECT. The MPT strategy resulted in 7.55 QALYs, and the MECT strategy yielded 11.43 QALYs. Therefore, MPT cost $57 762 per QALY and MECT cost $24 616 per QALY.
We performed a sensitivity analysis by varying all cost and utility variables across their plausible ranges. We found no cost or utility variable to be sensitive; that is, MECT remained the preferred treatment strategy across the ranges of these variables. We varied the probability of depression between 0 and 1, thereby simultaneously varying the probabilities of subsyndromal depression and complete response. MPT became the preferred treatment option only when the probability that depression would recur while patients received MECT exceeded 75%, a value outside the range suggested by the medical literature. Thus our results were robust across the plausible ranges of all variables.

**Discussion**

Our model suggests that MECT may be a more cost-effective maintenance treatment strategy than MPT in elderly patients with depression who have responded to initial ECT. The results of the model are robust to the changes in parameter values suggested by the uncertainty in the medical literature. The threshold for the cost-effective ratio to be judged a cost-effective health intervention is about $50 000 per QALY (42). Accordingly, MECT is a cost-effective strategy for managing elderly patients with depression.

Despite the growing body of evidence supporting the effectiveness of ECT in elderly depression patients, its use is limited because of unfavourable media portrayals, its history of abuse, increased scrutiny by the legal system, and the powerful support of anti-ECT activists (43). ECT is not commonly used for continuation management; it is usually discontinued once initial response has been achieved (44). Only 64% of the private hospitals that provide ECT treatment continue to provide MECT (45).

The cognitive dysfunction associated with ECT—especially recent memory impairment—is a limiting factor in the potential widespread use of MECT as a prophylactic management option for elderly patients with MDD. In discussing the impact of ECT on memory function, clinicians should consider the patient’s baseline cognitive functioning in addition to the impact of depression and the use of medication.

<table>
<thead>
<tr>
<th>Items and variables</th>
<th>Costs (US$)</th>
<th>Mean</th>
<th>Range</th>
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</thead>
<tbody>
<tr>
<td>Items used to calculate the cost variables below</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Antidepressant therapy for 6 months</td>
<td>2100.00</td>
<td>—</td>
<td></td>
</tr>
<tr>
<td>Hospitalization, per day</td>
<td>2472.72 + 69.20</td>
<td>—</td>
<td></td>
</tr>
<tr>
<td>Outpatient visit to professional, per visit</td>
<td>72.49</td>
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<tr>
<td>Home health visit, per visit</td>
<td>100.00</td>
<td>—</td>
<td></td>
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<tr>
<td>Family or provider care, per day</td>
<td>99.00</td>
<td>—</td>
<td></td>
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<tr>
<td>Lost wages or leisure time lost, per day</td>
<td>70.00</td>
<td>—</td>
<td></td>
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<tr>
<td>ECT, per session</td>
<td>295.39</td>
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<tr>
<td>Cremation</td>
<td>1450.00</td>
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<td></td>
</tr>
<tr>
<td>Traditional burial</td>
<td>6000.00</td>
<td>—</td>
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<tr>
<td>Variables used in model</td>
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<tr>
<td>Cost of depression on MPT</td>
<td>8489.00</td>
<td>6840.00 to 14 030.00</td>
<td></td>
</tr>
<tr>
<td>Cost of depression on MECT</td>
<td>9531.00</td>
<td>6930.00 to 24 533.00</td>
<td></td>
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<tr>
<td>Cost of subsyndromal depression on MPT</td>
<td>8654.00</td>
<td>6115.00 to 15 500.00</td>
<td></td>
</tr>
<tr>
<td>Cost of subsyndromal depression on MECT</td>
<td>9688.00</td>
<td>6150.00 to 22 460.00</td>
<td></td>
</tr>
<tr>
<td>Cost of being well on MPT</td>
<td>6654.00</td>
<td>4700.00 to 9780.00</td>
<td></td>
</tr>
<tr>
<td>Cost of being well on MECT</td>
<td>7960.00</td>
<td>5800.00 to 19 700.00</td>
<td></td>
</tr>
<tr>
<td>Initial ECT</td>
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<td>5800.00 to 19 700.00</td>
<td></td>
</tr>
<tr>
<td>Death expenses</td>
<td>5000.00</td>
<td>895.00 to 10 000.00</td>
<td></td>
</tr>
<tr>
<td>Autopsy or medical examiner</td>
<td>1750.00</td>
<td>1500.00 to 2000.00</td>
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</tr>
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*Wholesale price
Government payment rate
Data are from the Michigan visiting nurse program
Data are from the Bureau of Labor Statistics
Data are from the Dave Deighton Funeral Home and Cremation Planning Center, Ann Arbor, Michigan
Data are from the Department of Pathology University of Michigan, Ann Arbor, Michigan
University of Michigan Department of Pathology
Although depression in the elderly is usually complicated by the presence of physical illnesses and cognitive impairment, elderly depression patients’ toleration of ECT is similar to that of younger patients (36). Stoudemire and colleagues have reported that cognitive functioning is generally stable at 6-month follow-up, and, in some patients who receive ECT with MPT, it is actually improved (46). In fact, many domains of cognitive functioning, such as perceptual, attention, and motor functions, improve after MECT (47).

The degree of compliance with MECT is another factor limiting its possible widespread use. Compliance is also a significant factor related to the outcome of MECT (48). Noncompliance with MECT might be explained by the current cost of ECT, the unavailability of ECT facility providers outside academic institutions, the lack of caregivers for the elderly population, and intolerance of ECT side effects.

Our model indicates that the cost-effectiveness of MECT for elderly patients with depression exceeds that of MPT. However, it is also important to highlight several limitations related to the analysis. First, the results can be applied only to elderly depression patients who respond to acute ECT treatment. Second, the parameter estimates in the model were derived from the available literature and are subject to uncertainty. Most of the relevant literature is in the form of case reports, retrospective studies, and nonrandomized prospective studies.

Third, the treated subjects assigned to MECT without medication may not reflect current clinical practice in the psychiatric community, where some patients receive both interventions at the same time.

For this promising treatment to be adopted more widely, it will be necessary to increase the number of facilities that provide ECT; to minimize the stigma associated with its use by offering teleconferences, symposiums, and presentations; and to conduct more research studies in the area of MECT to answer many of the unresolved questions related to its use. In conclusion, MECT is more cost-effective than MPT in treating elderly patients with depression who respond to acute ECT.

### References

Résumé : Coût-utilité de 2 traitements d’entretien pour des adultes âgés souffrant de dépression qui ont répondu à un traitement d’électrochoc : résultats d’un modèle d’analyse de décision

Objectif : La prévalence du trouble dépressif majeur (TDM) chez les populations âgées résidant dans la communauté est de 1 % à 3 %. Après un traitement initial de la phase aiguë de la dépression, quelque 25 % à 30 % seulement des patients âgés demeurent rétablis, après un suivi de 1 à 3 ans. Des études antérieures indiquaient que les patients ayant reçu un traitement d’électrochoc d’entretien (TEE) présentaient des taux inférieurs de rechute, un meilleur sentiment de bien-être subjectif, et de moindres coûts de soins de santé, au suivi de 12 mois. Cette étude présente une analyse coût-utilité de 2 traitements d’entretien pour la dépression récurrente chez les personnes âgées.

Méthode : Nous avons utilisé le modèle de décision de Markov pour comparer la pharmacothérapie d’entretien (PTE) avec le TEE dans une cohorte théorique de personnes âgées souffrant de TDM qui a répondu à un traitement initial d’électrochoc. Nous avons estimé les coûts totaux et le total des années-personnes sans invalidité (APSI) pour chaque stratégie, ainsi que le coût par APSI.

Résultats : Le modèle a produit un coût par patient de 436 102 $ pour la PTE, et de 281 356 $ pour le TEE. La stratégie PTE a donné 7,55 APSI, alors que la stratégie TEE a produit 11,43 APSI. Par conséquent, la PTE coûte 57 762 $ par APSI, et le TEE coûte 24 616 $ par APSI.

Conclusion : Notre modèle suggère que le TEE peut être plus rentable que la PTE pour le traitement d’entretien d’adultes âgés souffrant de dépression qui ont répondu à un traitement d’électrochoc en phase aiguë.