

## RESULTS:

Per client treated with CBT, the estimated benefits to society are EUR10,000-14,000 and EUR9,700-13,000, for alcohol and cannabis addiction, respectively. These benefits result from reduced morbidity and mortality, improved quality of life, higher productivity, fewer traffic accidents, and fewer criminal activities.

## CONCLUSIONS:

This SCBA shows that not only treated clients but also society will benefit from an increase in people treated with CBT in specialized addiction care centers.

## REFERENCES:

1. Over EAB, van Gils PF, Suijkerbuijk WM, Lokkerbol J, de Wit GA. Maatschappelijke kosten-baten analyse van cognitieve gedragstherapie voor alcohol- en cannabisverslaving (with English Synopsis) RIVM, Bilthoven 2016 (<http://www.rivm.nl/bibliotheek/rapporten/2016-0193.pdf>).

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## PP018 Clinical Risk Prediction Scores For Venous Thromboembolism In Hospitalized Patients

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### INTRODUCTION:

Risk prediction scores have been devised to identify patients at increased risk for Venous Thromboembolism (VTE) in different patient populations and settings. Guideline recommendations for VTE risk assessment vary greatly. We performed a systematic review to synthesize evidence on clinical risk prediction scores for VTE in hospitalized medical and surgical patients.

## METHODS:

We systematically searched Medline, EMBASE, Cochrane, National Institute of Health and Care Excellence (NICE), National Guidelines Clearinghouse (NGC), and Guidelines International Network (GIN) databases up to March 2016. We included studies validating risk prediction scores for adult hospitalized patients. We excluded studies for any of the following reasons: non-English publication, conducted in non-OECD (Organisation for Economic Co-operation and Development) countries, validation cohorts focused solely on critical care patients, or scores developed for specific surgical or medical sub-specialty populations. We plotted receiver operating characteristic (ROC) curves of included studies and performed summary ROC meta-analyses for scores in which > 1 external validation studies were combinable. Risk of bias was assessed qualitatively. We assessed the strength of the evidence base using Grading of Recommendations Assessment, Development and Evaluation (GRADE).

## RESULTS:

We screened 110 primary studies and included 18 of those for analysis. There were seven studies of the Caprini score, three studies of the Padua score, two studies of the IMPROVE score; and one study each of the Arcelus, Geneva, Khorana, RAP, and Kucher scores. Strength of evidence was downgraded for study risk of bias because most studies disproportionately included patients at high risk of VTE. Our summary estimates of the performance of the three combinable scores at clinically-relevant thresholds are: Caprini score at a threshold of three in surgical patients – 96 percent sensitivity, 44 percent specificity; IMPROVE at a threshold of one in medical patients – 96 percent sensitivity, 20 percent specificity; and Padua at a threshold of 4–87 percent sensitivity and 58 percent specificity.

## CONCLUSIONS:

There is moderate strength evidence for use of the Caprini score to predict VTE in surgical patients and for the Padua and IMPROVE scores in medical patients. Lower thresholds may be warranted to achieve sufficient sensitivity to identify low risk populations who

may not require routine VTE prophylaxis. Studies making direct comparisons of risk prediction scores in similar patient populations are lacking and are necessary to ascertain which score is most effective.

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## PP019 Clostridium Difficile Infection Diagnosis: Hospital-based Health Technology Assessment

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### INTRODUCTION:

Clostridium difficile infection is the leading cause of nosocomial diarrhea in developed countries and may progress to pseudomembranous colitis, sepsis and death. The risk factors are antibiotics use, advanced age and prolonged hospitalization. The diagnosis of Clostridium difficile infection is based on clinical history in combination with laboratory tests, which detect the Clostridium difficile presence or toxins. Clostridium difficile remains in spore form contaminating the environment and requiring measures to prevent hospital transmission. Tests with more accurate results to identify true carriers of Clostridium difficile allow the clinician to determine a safer treatment. This study evaluated accuracy and cost-effectiveness of the real-time polymerase chain reaction compared with the enzyme-linked immunosorbent assay from the perspective of a Brazilian public cardiology hospital.

### METHODS:

A study diagram was constructed by type of test, linking the data of prevalence in hospital, accuracy and direct costs of tests. The costs were based on a hypothetical population comparing two strategies to identify the incremental expenditure between technologies. The analysis included comparisons for each test versus no test, and with each other. The prices were converted to

the American currency taking into account the date of purchase of each product and respective price.

### RESULTS:

For real-time polymerase chain reaction test versus no test, 214 patients would have tested to justify one empirical treatment suspension, at a cost of USD90,926.46. For enzyme-linked immunosorbent assay test, to prevent one unnecessary treatment, 375 patients would have to be tested at a cost of USD6,603.75. In the comparative analysis, only a single false-positive patient would have the treatment suspended after performing 375 real-time polymerase chain reaction tests at USD424.89 each one (USD159,333.75 in total). An incremental cost of USD152,730.00 may be necessary to benefit a single patient by discontinuing empirical treatment.

### CONCLUSIONS:

The Real-time polymerase chain reaction test has restrictions as a test of choice for the diagnosis of Clostridium difficile infection, in services with low disease prevalence. It undergoes a significant change in its positive predictive value and does not offer a great impact in the clinical diagnosis.

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## PP020 Decision-Making Beyond Evidence Alone – Topic Prioritization For Health Technology Assessment

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### INTRODUCTION:

The number of health technologies needing evaluation far outweighs available resources, and most Health Technology Assessment (HTA) agencies use criteria-based frameworks for topic prioritization (1,2). Despite variability, most frameworks include clinical, economic and budget impact. Some limitations of