



<b>Title</b>	<b>Clopidogrel versus Other Antiplatelet Agents in the Secondary Prevention of Vascular Events in Adults with Cerebrovascular Disease: Clinical and Cost- Effectiveness Analyses</b>
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## Aim

To compare the clinical and cost effectiveness of clopidogrel, alone or in combination with acetylsalicylic acid (ASA) versus other antiplatelet regimens including ASA, ticlopidine, dipyridamole, and combination fixed-dose ASA and extended-release dipyridamole (ERDP) in secondary prevention of myocardial infarction (MI), stroke, or vascular death in adult patients with cerebrovascular events (stroke, transient ischemic attack); to determine the optimal duration of treatment with clopidogrel in secondary prevention of vascular events in adult patients with cerebrovascular events; and, to review North American clinical practice guideline recommendations for the use of clopidogrel.

## Conclusions and results

The estimates of effects with clopidogrel, ticlopidine, and dipyridamole relative to ASA were inconclusive. Economic analysis found ASA to be the most cost-effective option in secondary prevention of recurrent stroke in patients with a mean age of 60 years at the time of their initial stroke. For patients in this age group who do not tolerate ASA, ASA-ERDP may be a cost-effective alternative. ASA-ERDP was the most cost-effective option in patients aged 70 years or older at the time of their initial stroke. These conclusions assume a willingness-to-pay threshold of \$50 000 per QALY, and are subject to the limitations of the analysis.

## Recommendations

Not applicable.

## Methods

Two systematic reviews (1 clinical, 1 economic) of studies comparing clopidogrel with other antiplatelet therapies in managing stroke patients were conducted according to a prior protocol. Economic evaluation was performed to determine the cost effectiveness of clopidogrel, ASA, ASA plus clopidogrel, dipyridamole, ASA-ERDP, or ticlopidine in managing stroke patients. Clinical practice guidelines were reviewed and assessed.

## Further research/reviews required

Further research is needed to answer many of the questions posed in this report due to unavailability of studies using direct comparisons or studies evaluating duration of treatment.

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