TITLE: Intravenous Mannitol and/or Dexamethasone for the Management of Acute Traumatic Brain Injuries in Adults: Clinical Evidence for Optimal Administration Timeframe and Guidelines

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RESEARCH QUESTION:

1. Is there clinical evidence supporting when intravenous mannitol and/or dexamethasone should be administered for optimal management of acute traumatic brain injuries in adults?

2. What are the guidelines for the administration of intravenous mannitol and/or dexamethasone for the management of acute traumatic brain injuries in adults?

METHODS:

A limited literature search was conducted on key health technology assessment resources, including PubMed, the Cochrane Library (Issue 1, 2009), University of York Centre for Reviews and Dissemination (CRD) databases, ECRI, EuroScan, international health technology agencies, and a focused Internet search. Results include articles published between 1998 and January 2009, and are limited to English language publications only. Filters were applied to limit the retrieval to health technology assessment, systematic reviews, meta-analyses, randomized controlled trials, and guidelines. Internet links are provided, where available.

RESULTS:

HTIS reports are organized so that the higher quality evidence is presented first. Therefore, health technology assessment reports, systematic reviews, and meta-analyses are presented first. These are followed by randomized controlled trials and guidelines.

Two systematic reviews and two randomized controlled trials were identified on intravenous mannitol and/or dexamethasone for the management of acute traumatic brain injuries in adults. No health technology assessments or evidence-based guidelines were identified. Additional articles of interest are located in the appendix.
Health technology assessments
No literature identified

Systematic reviews and meta-analyses


Randomized controlled trials


Guidelines and recommendations
No literature identified

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APPENDIX – FURTHER INFORMATION:

Observational studies


Guidelines and recommendations


Additional references