

Prescription of emergency antiepileptic medication after a first childhood seizure: analysis of routine administrative data

Richard FM Chin^{1,2}, Omotomilola Ajetunmobi^{1,3,4},
Christopher J Weir^{1,3,5}, Rachael Wood^{1,3,4}

¹ Muir Maxwell Epilepsy Centre, University of Edinburgh

² Royal Hospital for Sick Children,

³ Centre for Population Health Sciences, University of Edinburgh

⁴ Information Services Division, NHS National Services Scotland

⁵ Edinburgh Health Services Research Unit, Edinburgh, United Kingdom

Received November 13, 2014; Accepted February 08, 2015

Background

- UK guidelines indicate that emergency antiepileptic drugs should not be routinely given for febrile seizures (FS) or for single afebrile seizures (SAS).
- However, guidelines are not always adhered to.

Aim/Method

- Aim:

To test the hypothesis that a high proportion of children with a febrile seizure (FS) or a single afebrile seizure (SAS) will be prescribed emergency antiepileptic drugs (AEDs)

- Method:

Retrospective cross-sectional study using linkage of routine administrative hospital discharge and community prescribing records. Only children aged under five years admitted to a Scottish hospital with a first FS or SAS between April 2009 and March 2012 were included.

Results

- There were 1,978 children aged under five years admitted to hospital for a first FS, and 663 for SAS.
- Community prescriptions for AEDs within 12 months of admission were reported in 0.9% of those admitted for a first FS and 1.7% for those admitted with a first SAS.
- Total cost of emergency antiepileptic drugs following FS and SAS for the study period was just over £900

Conclusions

- In Scotland, there is a high level of adherence to the current guidelines. Only a small proportion of children with a first FS/SAS were routinely prescribed emergency AEDs.
- Routinely collected administrative data can be used to address clinically relevant questions.
- It would be of interest to compare and contrast results on adherence with other countries where there are nationally agreed guidelines for prescribing emergency AEDs.