Fits and faints

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Epilepsy

- Common long-term condition in CYP
- 63400 people under age of 18 in the UK (JEC 2011)
- ≈ 2000 CYP in London
  - 1-2 people in each mainstream primary school
  - 4-5 people in each mainstream secondary school
  - Common in special school population
- HLP guidance states primary care role is to:
  - Keep up to date with NICE guidance
  - Specifically know when to refer

Healthy London Partnership

Young Epilepsy

Why ‘first fit’ clinics?

- Because NICE says so!
- ~40 different types (‘the epilepsies’)
- High rates of misdiagnosis
  - e.g. 40% in a tertiary clinic study
  - e.g. Leicester/NI inquiries

Should I refer?

- Clinical description – the 'semiology'
- Video (increasingly useful & easier to obtain)
- Epilepsy imitators
  - Syncopal/anoxic
  - Behavioural/psychological/psychiatric
  - Sleep-related
  - Paroxysmal movement disorders
  - Migraine
  - Miscellaneous
  - https://www.epilepsydiagnosis.org/epilepsy-imitators.html

Key history

- Preceding moments
- Triggers
- The event
- Awareness
- Length
- Post-event

semiology

- Video?
- Birth/PMH/Development/Family history

Q2: If seizures, is it epilepsy?

Definition:

1. 2 unprovo 24 hours)
2. 1unprovoked se her seizure over the next 10 years (i
   (judge on PMH, P
3. Diagnosis y syndrome

REFER

TO FIRST SEIZURE CLINIC

Investigations

- Bloods
- ECG
- EEG
- Sleep EEG
- MRI

} provoked/non-epileptic cause for seizure

Investigations

- EEG
  - Chance of abnormality variable (44% if GTCs, 92% in absences)
  - If epileptiform discharges, ~66% chance of epilepsy (based on 50% pre-test probability)
  - Normal inter-ictal EEG does not mean it is not epilepsy
  - Depends on index of suspicion
- Sleep EEG (increases yield)
- MRI (unless clear electroclinical syndrome)

Bouma, H. K., Labos, C., Gore, G. C., Wolfson, C., & Keezer, M. R. (2016). The diagnostic accuracy of routine electroencephalography after a first unprovoked seizure. European journal of neurology, 23(3), 455-463.
Baldin, E., Hauser, W. A., Buchhalter, J. R., Hesdorffer, D. C., & Ottman, R. (2014). Yield of epileptiform electroencephalogram abnormalities in incident unprovoked seizures: A population-based study. Epilepsia, 55(9), 1389-1398
Baldin, E., Hauser, W. A., Buchhalter, J. R., Hesdorffer, D. C., & Ottman, R. (2017). Utility of EEG activation procedures in epilepsy: a population-based study. Journal of clinical neurophysiology: official publication of the American Electroencephalographic Society, 34(6), 512.

Advice

- Seizure first aid (video/infographic)
  - Physical safety
  - Timing
  - Video
  - When to call ambulance
  - Recovery position
- Seizure safety
  - Showers>baths
  - Heights (e.g. public transport)
  - Cycling
  - Swimming

Care after epilepsy diagnosis

- ensuring ongoing supply of AEDs (medication)
- monitoring for presentation of complications from epilepsy and/or from medication
- managing both pre-existing, and monitoring for new, co-morbidities and related issues
- providing support for children, young people, family and carers
- helping to facilitate transition to adult services, alongside the young person's epilepsy team, as per locally agreed path

https://www.nice.org.uk/guidance/cg137
https://www.healthylondon.org/resource/london-epilepsy-standards-for-children-and-young-people/
https://www.youngepilepsy.org.uk/guide-for-schools/

Summary

- History key to identifying suspected seizures vs other paroxysmal events
- Suspected seizures = urgent referral to first seizure clinic
- Diagnosis of epilepsy is about pieces of the jigsaw
- Paediatric epilepsy is secondary care led, but important role for primary care