Acute Neurology

Charlotte Lawthom
Or…

• Neurology isn’t just for Neurologists
Where are the neurologists?

- Despite Neurology conditions making up 10% to 20% of acute medical admissions..
- Many DGH only have Neurologists available 3 times a week
- ABN has set out clear guidance
- Minority of DGHs have acute neurology presence
- Many acute physicians are managing neurology admissions very well
- What can we add?
Our Service

• Neurologist of the Week
• Daily review in Acute Medical Unit
• Hot Clinics three times weekly
Case 1 - A Breathless Female

• 76 year old female presented with acute SOB
• 8 week history of weakness
• 6 weeks of diplopia, worse on lateral and vertical gaze
• 4 weeks of progressive swallow difficulty and 1 stone weight loss
• Slept sat up overnight
• Eventful ambulance journey …
Interactive Question

- Which is the most likely diagnosis?
- A) CVA
- B) CJD
- C) MOTOR NEURON DISEASE
- D) MYASTHENIA GRAVIS
Case 1 - A Breathless Female

- Summoned to Resuscitation room
- Quiet, female, sat upright, head falling forward, airway compromised, adjusted by me
- Medical students looking underwhelmed..
- ITU consultant arrived and immediately removed patient to ITU
- Teaching intervention provided with caffeine
Case 1 - A Breathless Female

- Diagnosis - Myasthenia Gravis
- Investigations - Ach R Antibody pending
- IVIG
- Avoided intubation and respiratory support (one on one nursing care)
- CT confirmed thymoma
- Readmitted for optimisation prior to successful surgery
- Now well on Azathioprine and pyridostigmine
Neurology Input

- Key component of modern Multi-professional emergency medicine
- Accept responsibility
- Are accountable
Success Depends On

- Highly functioning teams
- High levels of trust
- High levels of humour

“Coming together is a beginning; keeping together is progress; working together is success.”
-Henry Ford

#teamwork
www.viacharacter.org
Case 2 - Collapse At The Green Man

• 22 year old male referred to Hot Clinic.
• History obtained from GP suggestive of syncope but event occurred from being sat down and the timing was uncertain.
• I agreed to see the next day in Hot Clinic with his partner.
• Patient account: Hungover, no recreational drugs. Sat in the sun, felt some cramp, next recollection he came round flat on his back. Things seemed a bit strange. He recalled going to a medical tent. His recollection was patchy for the next 30 minutes
Case 2: Collapse At The Green Man

- Partner’s Account: He said he had a really bad cramp in his leg. He then seemed to breathe out and lean forward. She thought he was choking. She pulled him backwards onto her. His eyes were open and he was unresponsive. Unclear whether there was movement. He then started to choke and didn't respond to face tapping or calling his name. She then feared he was dead. He eventually came round and was very confused.
Case 2: Collapse At The Green Man

• Risk Factors for Syncope
  • No PHPC
  • Dehydrated
• Risk Factors For Epilepsy
  • No FH
  • Born at 42/40, no need for SCBU, weight unclear
• Triggering Factors
  • Sleep Deprivation
  • Alcohol
DVLA Guidance

• Updated guidance March 2016 affecting both syncope and blackouts with seizure markers.
First unprovoked epileptic seizure/isolated seizure

Must not drive and must notify the DVLA.

Driving will be prohibited for 6 months from the date of the seizure.

Clinical factors that indicate that there may be an increased risk of seizures require the DVLA not to consider licensing until after 12 months from the date of the first seizure.

Must not drive and must notify the DVLA.

Driving will be prohibited for 5 years from the date of the seizure.

If, after 5 years, a neurologist has made a recent assessment and clinical factors or investigation results (for example, EEG or brain scan) indicate no annual risk greater than 2% of a further seizure, the licence may be restored.

Such licensing also requires that there has been no need for epilepsy medication throughout the 5 years up to the date of the licence being restored. If the prospective annual risk of further seizure is greater than 2%, the epilepsy regulations may apply.

continued
## Transient loss of consciousness – solitary episode

<table>
<thead>
<tr>
<th></th>
<th>Group 1 car and motorcycle</th>
<th>Group 2 bus and lorry</th>
</tr>
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<tbody>
<tr>
<td><strong>Typical vasovagal syncope</strong></td>
<td></td>
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<tr>
<td><strong>While standing</strong></td>
<td><img src="green_circle.png" alt="Green Circle" /> May drive and need not notify the DVLA.</td>
<td><img src="red_circle.png" alt="Red Circle" /> Must not drive and must notify the DVLA.</td>
</tr>
<tr>
<td><strong>While sitting</strong></td>
<td><img src="caution_triangle.png" alt="Caution Triangle" /> May drive and need not notify the DVLA if there is an avoidable trigger which will not occur whilst driving. Otherwise must not drive until annual risk of recurrence is assessed as below 20%.</td>
<td><img src="red_circle.png" alt="Red Circle" /> Must not drive for 3 months and must notify the DVLA. Will require investigation for identifiable and/or treatable cause.</td>
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**Syncope with avoidable trigger whilst driving or otherwise reversible cause** *(for cough syncope see page 27)*

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### Unexplained syncope, including syncope without reliable prodrome

This diagnosis may apply only after appropriate neurological and/or cardiological opinion and investigations have detected no abnormality.

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<th>Must not drive and must notify the DVLA. If no cause has been identified, the licence will be refused or revoked for 12 months.</th>
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### Cardiovascular, excluding typical syncope

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Blackout with seizure markers

This category is for those where on the balance of probability there is clinical suspicion of a seizure but no definite evidence. Individuals will require assessment by an appropriate specialist and investigation, for example EEG and brain scan, where indicated.

The following factors indicate a likely seizure:
- loss of consciousness for more than 5 minutes
- amnesia longer than 5 minutes
- injury
- tongue biting
- incontinence
- post ictal confusion
- headache post attack.

While standing or sitting

- Must stop driving and notify the DVLA.
  6 months off driving from the date of the episode.
  If there are factors that would lead to an increased risk of recurrence, 1 year off driving would be required.

- Must stop driving and notify the DVLA.
  5 years off driving from the date of the episode.
Interactive Question

• Which category would you place him in?
  • A) Blackout with seizure markers
  • B) First unprovoked seizure
  • C) Unexplained syncope
  • D) Vasovagal syncope
Case 2: Collapse At The Green Man

- Examination
  - small right foot
- Plan
  - Ix: MRI and EEG (ECG undertaken and normal)
- Advice
  - refrain from driving and inform DVLA
  - refrain from climbing pylons element of work
  - avoid bathing alone
Case 2: Collapse At The Green Man

- Patient unhappy.. sought private opinion
- MRI Normal
- Patient began driving..
- EEG reported as abnormal with a left temporal focus.
- DVLA were informed by me of the abnormal EEG
- Patient currently refusing Anti-Epileptic Drugs
- He is aware of SUDEP.
Seizures

• Difficult to analyse seizures without a video
• Even when a witness account and background is clear
• Where uncertainty remains refer to DVLA guidance
The Future??
A wise man learns more from a fool than a fool from a wise man

Censorius