



Support Group Leader Training – Section 2-Lesson 1

Subject: Medication - Anti-epileptics / Anticonvulsants

There is a variety of medications available for the treatment of Trigeminal Neuralgia. Initial treatment is usually in the form of anti-epileptic medications. Carbamazepine (Tegretol®) being the first drug of choice. When medication fails, surgery may be considered.

Anti-epileptics / Anticonvulsants

- Used in treatment of pain since the 1960's
- Useful for neuropathic pain, especially if pain is lancinating or burning in nature
- Specific mechanisms of action uncertain, but likely to stabilise the nerve membrane by blockade of voltage sensitive Na channels resulting in reduced ionic conductance of sodium and potassium

The following medications fall within this category

Carbamazepine (Tegretol) – NNT to obtain 50% relief – 1.7

- Controlled release preparation better tolerated than immediate release usual tablet
- 200mg nocte increasing slowly to 400mg bd
- Response within a week in 65-80%
- Minor SE: sedation, dizziness, nausea, unsteadiness, rash
- Major SE: bone marrow suppression, liver function abnormalities, hyponatremia
- Serum therapeutic ranges are irrelevant
- 4 placebo control trials showing effectiveness

Sodium Valproate (Epilim)

- Better tolerated than Tegretol
- Increases activity of the inhibitory transmitter GABA
- 200mg nocte increasing to 400mg bd
- SE: GIT, weight gain, tremor
- Hepatic dysfunction so LFT's should be monitored
- Serum therapeutic ranges are irrelevant
- Oxcarbazepine (Trileptal)
- Active metabolite of Tegretol therefore has less side effects of sodium, dizziness, drowsiness and lethargy
- Slightly less potent than Carbamazepine, so higher doses needed
- 4 studies in Canada and Europe show it is as effective as Tegretol (70-80% response)
- Not covered by PBS currently in Australia and costs approx. \$90 per month

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Pregabalin (Lyrica)

- Works on alpha-2-delta ligand
- Analgesic, anxiolytic and anti-convulsant
- SE's: Dizziness, somnolence, blurred vision, weight gain and peripheral oedema
- 25mg nocte increasing slowly to 300mg bd

Gabapentin

- Used in a variety of neuropathic pain conditions such it prevents allodynia and hyperalgesia
- Improves pain and sleep
- Designed as an analogue of GABA, but also acts also on NMDA receptors
- 100mg nocte titrating up to 1800mg/day
- SE's: ataxia, drowsiness, fatigue

Please complete the Knowledge Test – Medication - Anti-epileptics / Anticonvulsants Quiz 1 - before moving to the next training file