

## **Peri- and Post-Operative use of Gabapentinoids for neuropathic pain after Trauma & Orthopaedic Surgery and Vascular Surgery**

### **Background**

The number of prescriptions for gabapentin and pregabalin has increased exponentially over the past 10 years, with increasing concerns about side effects and abuse (including 190 drug-related deaths). In response to these concerns, on April 1st 2019 gabapentinoids were reclassified to Class C controlled drugs to tighter regulate their prescribing. Gabapentinoids are often used as an adjunct for pain management peri and post-operatively, with many patients being discharged from hospital on these medications.

### **Aims and Objectives**

This audit looked at the number of discharge prescriptions for gabapentinoids in 2013 versus 2018 for Trauma & Orthopaedic (T&O) and Vascular Surgery at one hospital, and whether instructions for stopping treatment or GP follow up were given with discharges. The aim was to bring attention to the reclassification and to suggest prescribers add stop dates or GP follow up instructions, particularly if these medications are only thought to be required acutely. This is in order to prevent their continued use in the long term when unnecessary.

### **Methods**

A literature review was performed looking at current research around peri and post-operative use of gabapentinoids, their abuse, current national and local guidelines and the recent reclassification of these drugs. Data collection involved obtaining a spreadsheet listing all patients discharged from the hospital on gabapentin or pregabalin between 2013 and 2018, which was narrowed down to those discharged from T&O and Vascular Surgery from January-February 2013 versus 2018.

### **Results**

There was an overall increase in the number of patients discharged on gabapentinoids in 2013 versus 2018, from 336 to 647 for pregabalin, and 175 to 407 for gabapentin. When patients prescribed these medications prior to admission were excluded, the increase appeared less significant: 36 new prescriptions for 2013 versus 47 in 2018. A paired test showed this was not statistically significant, with a p-value of 0.27 and a 95% confidence interval of -0.34 to 0.08. However, data was only across two months so may not be representative. Only 4 discharge letters gave stop dates and none indicated need for GP follow up. No guidelines were found specifically regarding this use of gabapentinoids.

### **Conclusions**

Overall there appeared to be an increase in patients being discharged on these drugs between 2013 and 2018, with the increase being less significant for just 'new' prescriptions. This may be reflective of increased prescribing in primary care, or patients being discharged from hospital on these drugs but never tapered off. To improve prescribing of gabapentinoids a clear stop date is needed on discharge letters, with advice for GP follow up to taper doses according to patient response. Also, a patient information leaflet would be beneficial, to increase understanding and re-iterate the need for GP follow up. Further studies are needed to research whether specific treatment regimens, drug combinations and lengths of treatment have better outcomes in order to develop guidelines on this use of gabapentinoids.