

Are we adequately reviewing confusion inducing drugs in patients referred to the memory assessment service?

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Background

- It has long been established that anti-cholinergic medications (ACMs) have contributed to short-term cognitive impairment in patients taking them (1)(2)(3).
- More recently there has been a robust association made between some classes of anticholinergics and future dementia incidence (this being reversible dementia.) (4)
- The impact of polypharmacy, subsequent anti-cholinergic burden, and the overlapping presence of delirium, may call into question the validity of a diagnosis of dementia in patients who have not been correctly screened during their initial assessment.

Aims & Hypothesis

- To establish the current standard of practice with regards to reviewing confusion inducing drugs (CIDs) in the memory assessment service.

Method

- All new referrals to the memory assessment service in the months of July and August were collected, amounting to 216 cases.
- Each case was systematically reviewed by looking at the memory referral clinical document, as well as the progress notes from the point of first contact.
- An individual case was examined for a clear statement in the documentation, that a CID review had been completed, and whether the impact of the offending medication had been specified.
- The data collection tool was used to gather information including: age, gender, GPCOGG/6CIT/MMSE score, final diagnosis, CID prescriptions, CID review (initial referral, by dementia support worker, by ANP/medic, or in MDT/ANP supervision.)

Results

- **The results were collated using a data set of 216 patients (136 females and 80 males,) of which the mean age was 79 years. The ages of youngest and oldest patients were 31 years and 98 years respectively. The median and modes ages was 81 and 86 respectively.**
- The data showed that 39.8% of patients were found to have some form of an amnesic syndrome.

Discussion

- The data showed us that there is a clear deficiency in the number of patients that are properly screened for CIDs that may have resulted in a delay in formalising the diagnosis and initiating the appropriate treatment, meaning that it may be having an adverse effect on the patient's outcome.
- Further study is required in order to assess the impact this is having on our patients, and to establish whether there is a causative link or simply a correlation.
- There is anecdotal evidence from a few of the cases that we have reviewed that the cessation of the CID resulted in an improvement in cognition and subsequent discharge from the clinic.
- There is also a scarcity of research into the long-term effects on cognition of taking ACMs.
- It would also be beneficial to look specifically at the offending CIDs to see which of them are most likely to have an impact on cognition, as they have varying levels of anticholinergic burden.

Recommendations

- Issue each dementia support worker and nurse with a CID prescription review card, which will list those medications to consider and flag for review and to document each entry.
- Disseminate our findings to local GPs to raise awareness of deficiencies in practice.
- Encourage GPs to carry out a more comprehensive screening before referral.

References

1. K Alagiakrishnan, C A Wiens. An approach to drug induced delirium in the elderly. Postgrad Med J 2004;80:388–393.
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3. Han L, McCusker J, Cole M, et al. Use of medications with anticholinergic effect predicts clinical severity of delirium symptoms in older medical inpatients. Arch Intern Med 2001;161:1099–105.
4. Richardson Kathryn, Fox Chris, Maidment Ian, Steel Nicholas, Lake Yoon K, Arthur Antony et al. Anticholinergic drugs and risk of dementia: case-control study BMJ 2018; 361 :k1315.

Number of Patients with a documented CID prescription review



Proportion of patients taking CID prescriptions

