Trimming the Fat – GP Abdominal Ultrasound in Asymptomatic Patients with Deranged LFTs

Background to the audit

Whilst clinically silent in the early stages, risk factors for non-alcoholic fatty liver disease (NAFLD) are readily identifiable. Management is founded upon lifestyle modification and monitoring blood results. The identification of risk factors and detection of LFT derangement, in the absence of symptoms, is enough to make the diagnosis and initiate management, without imaging or secondary care referral. Limiting the number of patients undergoing unnecessary ultrasound, which often yields results that do not alter patient management.

Standard

'RefHelp' is an online clinical tool accessible through the NHS Lothian intranet. It provides instant access to referral guidelines that can be used to appropriately direct patients for imaging. 'RefHelp' guidelines for the investigation of deranged LFTs in asymptomatic patients was the standard used.

Indicator

Two sets of abnormal LFTs, checked 4 weeks apart, which meet specific biochemical and agerelated criteria.

Target

100% compliance of ultrasound requests.

Methodology

All GP abdominal ultrasounds completed at the Western General Hospital (WGH) in November 2022 were analysed and retrospectively assessed against the NHS Lothian 'RefHelp' guidelines.

Results of 1st audit round

In 2022, 38,138 GP ultrasound scans were carried out across NHS Lothian. Of these, 21% (7771) were abdominal scans. This equates to 648 ultrasound sessions a year. In November 2022 at the WGH, 102 GP abdominal scans were carried out, 32 for the indication of asymptomatically deranged LFTs. Of these only 6 patients (19%) met guidance for ultrasound referral. All scans demonstrated results that would not change clinical management, mostly hepatic steatosis or a normal study.

This has led to a potential excess of 2,080 scans per year, 692 hours of scanning, or 173 additional ultrasound sessions.

1st action plan

A revamp of the 'RefHelp' webpage to include a more user-friendly flow-chart. Implementation of a new virtual requesting pathway including mandatory tickable criteria.

A collaborative approach with GP representatives to encourage appropriate, triaged requesting at the integrated primary care and radiology meetings.

Ultimately, patients could be safely managed with lifestyle advice and monitoring blood tests in primary care. A decrease of 2,080 ultrasound scans a year could be safely achieved across NHS Lothian, saving £122,830 and having a large impact on reducing radiology workload.

References

NHS Lothian 'RefHelp' guidelines. Accessible at https://apps.nhslothian.scot/refhelp/guidelines/abnormallftsincfib4score/.

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