

understanding of the risks associated with pulmonary misplacement and how to improve delivery of service is required. It is well known that feeding through a pulmonary placed NGT can lead to serious harm or mortality. The National Patient Safety Agency (NPSA) issued guidelines in 2011 to try to reduce reported cases of feeding into the lungs. However, it is unknown whether the introduction of an NG tube into the lungs, in itself can introduce infection.

Methods We conducted two snapshot audits at a tertiary centre between 2012–2013. Between these audits, organised training of nursing and core medical trainees was conducted. Audits involved spot-checks on 34 wards, assessing notes of all patients with NGTs *in situ* that day. These were then compared to NPSA guidelines.

We also did a retrospective study on the outcome of cases with pulmonary misplaced tubes, between 2012–2013. To identify these, chest X-ray reports were searched. Patient mortality and cases that later developed sepsis or chest infection were calculated. They were then compared to a group of controls that did have correctly placed NGTs.

Results The number of patients with NG tubes *in situ* were 38 and 46 in 2012 and 2013 respectively. None of these had cases of pulmonary misplacement. After the training that staff received there was a remarkable improvement in guideline adherence in 2013. Documentation of insertion increased by 46% ($p < 0.001$), and length of NGT recording increased by 53.9% ($p < 0.001$). pH checks being the first line confirmation of position, rather than X-ray, increased by 33.8% ($p = 0.002$). In the 18 patients that had pH checks in 2013, 7 patients did not require a second line X-ray to check position.

From the radiology search there were 27 patients that did have pulmonary misplacement out of a total of 1332 (2.03%). For mortality $RR = 1.33$ (95% CI: 0.8424 – 2.1077, $P = 0.2199$). For development of infection the $RR = 1.94$ which was statistically significant (95% CI: 1.1362 – 3.3207, $P = 0.0152$). Direct logistic regression was performed on patient age to assess the impact on the likelihood of developing disease. However, this was not found to be statistically significant.

Conclusion It appears that training of both nursing and medical staff can have a huge benefit in increasing adherence to guidance. This study suggests that patients are nearly twice as likely to develop chest infection or sepsis after pulmonary misplacement of their NGT. Although other factors such as age have been shown to have little affect on this outcome, factors such as patient morbidity before misplacement could not be assessed.

Disclosure of Interest None Declared.

PTH-036 END OF LIFE CARE IN LIVER DISEASE

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Introduction Living and Dying Well: a national action plan for palliative and end of life care for Scotland calls for the identification, assessment, monitoring and care planning for palliative patients, irrespective of diagnosis or location. The primary aim of this project was to audit the assessment, care planning and recording of palliative status in the Gastroenterology Department in Aberdeen.

Methods Patients who died of chronic liver disease between July 2011 and May 2012 were identified using a retrospective notes review approach. A data capture sheet was devised in consultation with Senior Medical staff from the Gastroenterology and Palliative Medicine Departments.

Results Twenty patients were identified. The audit standard of 90% was met in the following: dying recognised and recorded in the medical notes; dying recognised and recorded in the nursing notes; DNACPR in place; record of discussion with the family and agreed plan with family; anticipatory prescribing. The 90% standard was not met for medication review, discontinuing unnecessary medication or non-essential monitoring/ interventions. None of the prognostic tools examined (MELD, Child Pugh, MI, GAHS) showed high sensitivity for recognising poor prognosis in this patient group. Almost all the patients who died in the acute sector had been admitted as unscheduled emergencies. None had any evidence of pre-admission advance care planning.

Conclusion This audit demonstrated a high standard of end-of-life care in the GI unit despite the difficulties identified in prognosticating in this patient group. There is a need to further explore whether advance care planning is possible and practicable for patients with chronic liver disease.

REFERENCE

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PTH-037 ADHERENCE TO 2013 BSG BARRETT'S OESOPHAGUS SURVEILLANCE GUIDELINES COULD FACILITATE SAFE DISCHARGE OF PATIENTS

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Introduction The prevalence of Barrett's oesophagus (BO) is increasing and surveillance of this population is a growing burden for endoscopy units.¹ Guidelines exist to facilitate quality surveillance but are poorly adhered to.² We evaluated previous endoscopy (OGD) and histology reports of patients due to undergo BO surveillance in 2014 at a UK district general hospital. By using the 2013 BSG guidelines we decided if sufficient data were available to discharge patients or increase their surveillance interval.³

Methods The endoscopy department provided a list of all adult patients booked for BO surveillance in 2014. Electronic reports were used to find the length of BO, presence/absence of intestinal metaplasia (IM), adherence to the Prague CandM criteria and compliance with the Seattle biopsy protocol (4 biopsies every 2 cm). A Consultant pathologist clarified any uncertain histology reports. Outcomes after reviewing the cases were: 'discharged from surveillance', 'delayed OGD' or 'no change to date of OGD'. No patients with long segment BO (>3 cm) had their endoscopies delayed. Finally hypothetical outcomes were calculated assuming all previous OGD's were compliant with BSG standards. Data were entered into an Excel spreadsheet and simple statistics used to analyse findings.

Results 125 patients were due BO surveillance in 2014. 96 male (77%), average age 64 years (range 34–84). 76 (61%) endoscopy reports were compliant with Prague CandM criteria. 33 (26%) reports were compliant with the Seattle biopsy protocol, whilst 92 (74%) were not. In 110 (88%) cases no change was made to

the planned surveillance date, either due to inadequate biopsies being taken to delay/discharge or appropriate date of surveillance already booked. 15/125 (12%) patients were either discharged or had their OGD delayed. If all procedures had been compliant with BSG standards this might have led to more than three times as many patients having their surveillance discontinued or delayed (48/125:38%).

Conclusion Using the 2013 BSG guidelines enables departments to safely discharge patients with Barrett's oesophagus or increase surveillance intervals. This will save money and reduce the risk and discomfort inherent with this program. Endoscopists adherence to the Seattle biopsy protocol is poor, and this is the main barrier preventing more patients from being discharged.

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PTH-038 ALBUMIN AS A PLASMA EXPANDER DURING LARGE VOLUME PARACENTESIS: ARE WE FOLLOWING THE GUIDELINES?

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Introduction Ascites is a major complication of cirrhosis occurring in more than 50% of patients within 10 years. Tense ascites is treated with large volume paracentesis (LVP) with human albumin solution (HAS) as a plasma expander. National and International guidelines recommend that cirrhotic patients undergoing LVP (>5 l) should have 8 g of HAS per litre of ascites drained. This equates to 1 unit of 20% HAS per 2.5 l of ascites drained. HAS is not recommended for non-cirrhotic ascites or small volume paracentesis (SVP), where <5 l of ascites is drained. Our aim was to see if local practice followed guidelines.

Methods We conducted an audit of all paracenteses occurring in a London district general hospital between January 2012 and October 2013. We included day unit patients and inpatients undergoing paracentesis. We reviewed medical notes, prescription charts and nursing records, including cases with suitable documentation.

Results Sixteen patients had a total of 48 drainage episodes between them, of which 9 were male and median age was 71 years (range 45–93 years). Eleven patients had cirrhosis and 5 had non-hepatic malignancy. Table 1 demonstrates that there were 36 paracentesis episodes in cirrhotic patients where LVP was carried out with a median of 4 units of HAS given per drainage. On the other 12 occasions HAS did not need to be

given. In 20/36 cases at least 2.5 l of ascites was drained for each unit of HAS given. In the 16 other cases of LVP in the cirrhotic patients, HAS was overprescribed with a total of 19 units being given unnecessarily in this group.

In total 25 units of HAS were given to patients undergoing small-volume paracentesis and those with malignant ascites. The cost per unit of HAS is £29, thus potentially £1276 could have been saved if guidelines had been followed. There were no complications associated with drain insertion nor was there any hypotension, acute kidney injury, or electrolyte disturbance related to HAS infusion.

Conclusion Albumin is often inappropriately prescribed to patients with malignant ascites and those undergoing small volume paracentesis. Of the paracenteses where HAS was indicated, 16/36 (44%) were overprescribed albumin. This has unnecessary cost implications as well as potential health risks due to the hyperoncotic properties of HAS. We conclude that reducing HAS usage by following guidelines during LVP would reduce costs without compromising patient safety.

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Disclosure of Interest None Declared.

PTH-039 PREVENTING POST-ENDOSCOPIC RETROGRADE CHOLANGIOPANCREATOGRAPHY (ERCP) PANCREATITIS: CHANGING PRACTICE AT A DISTRICT GENERAL HOSPITAL

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Introduction Post-ERCP pancreatitis (PEP) is one of the major endoscopic complications carrying 3.5% risk in unselected patients. Daycase ERCP is now the norm in the UK and emergency presentations with PEP may be expected. At Basildon Hospital, we sought to adopt ESGE guidelines (2010)¹ to prevent PEP with regards to: serum amylase testing, rectal non-steroidal anti-inflammatory (NSAID) and pancreatic duct (PD) stent use. Since March 2013, a protocol incorporating these recommendations was followed.

Methods A prospective audit between December 2012 to 2013 was performed to evaluate the effect of this management protocol. Data was collected on an audit proforma completed immediately following ERCP. Patient outcome was followed up via telephone on subsequent day or review of inpatient notes. Electronic records were searched for admissions within 2 weeks of ERCP.

Results 249 ERCP procedures were recorded over the 12 month period. 41% were male; 45% were performed as outpatient. Mean age was 68 years. Main indication was gallstones (60%).

Abstract PTH-038 Table 1

Cause of Ascites	Type of drainage	Number of drains	Median amount (Range) of ascites drained (L)	Median amount (Range) of HAS given (units)
Cirrhosis	LVP	36	9.9 (5.5–16.5)	4 (3–9)
	SVP	4	2.4 (1.2–4.45)	1.5 (1–3)
Malignant ascites	LVP	5	7.2 (5.0–8.0)	3 (3–5)
	SVP	3	3.8 (1.5–4.4)	0