

was applied resulting in bleeding cessation. She had self limiting post-procedural abdominal pain but no evidence of perforation on imaging. No clinical rebleeding occurred during the next 6 weeks, although she continued to require 2-weekly transfusions as before for her chronic anaemia. Patient 3 – a 72 year old man with advanced hepatocellular carcinoma, cirrhosis due to hemochromatosis, and transfusion dependent anaemia despite beta-blockers, presented with fresh rectal bleeding. Flexible sigmoidoscopy demonstrated severe portal hypertensive colopathy with active bleeding. Hemospray was applied and hemostasis achieved. He had no complications and no further rectal bleeding by 6 weeks. There was evidence of reduced transfusion requirements during this 6 week period. Patient 4 – a 66 year old lady with decompensated alcohol related cirrhosis presented with abdominal pain and melena. Emergency gastroscopy revealed active bleeding from severe proximal PHG. Hemospray was applied leading to hemostasis. Following the procedure the patient developed increasing abdominal pain and imaging showed evidence of free peritoneal air. She was deemed unfit for surgical intervention due to her co-morbidities and died of sepsis secondary to perforated abdominal viscus 4 days following the procedure.

**Conclusion** Hemospray appears to achieve hemostasis in acute non-variceal portal hypertensive bleeding. Further data are required on the outcome and safety of Hemospray use in this condition.

**Disclosure of Interest** None Declared.

**PWE-055** **ENDOSCOPIC ULTRASOUND GUIDED RADIOFREQUENCY ABLATION (EUS-RFA) FOR PANCREATIC DUCTAL ADENOCARCINOMA**

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**Introduction** The five year survival for pancreatic ductal adenocarcinoma (PDAC) is less than 5% in spite of the advances in management of cancers in the last few decades. Even though surgical resection remains the only potentially curative treatment for PDAC, only 10–20% of patients are candidates for pancreatic resection with almost 50% of patients having distant spread of tumour and approximately one-third manifesting locally advanced disease. Kahaleh and colleagues have demonstrated that EUS guided RF ablation (EUS-RFA) of the pancreatic head using Habib EUS-RFA catheter (Emcision Ltd, UK) was well tolerated in 5 Yucatan pigs and with minimal pancreatitis (1). The aim of this report is to outline the feasibility, safety, complications and early results of EUS-RFA using Habib catheter in patients with inoperable PDAC.

**Methods** Seven patients underwent EUS-RFA of PDAC. A novel monopolar radiofrequency (RF) catheter (1.2 mm Habib EUS-RFA catheter, Emcision Ltd, London) was placed through a 19 or 22 gauge fine needle aspiration (FNA) needle after FNA was performed.

**Results** Seven patients had EUS-RFA of PDAC with a median age of 69 (range 50 – 77) years. There were 3 female and 4 male patients. Five patients had PDAC in the head of pancreas whilst two had in the body of pancreas. RF was applied at 5 watts, 10 watts and 15 watts in an incremental manner in 1, 3 and 3 patients respectively. The median number of applications were 3 (range 2 – 4) and each application was 90 seconds. The EUS-RFA was completed in all patients. The mean size was 35.2mm and the post procedure imaging in 3–6 months showed decrease in size of the lesion in two

patients, whilst the lesions were unchanged in the rest of the patients. There were no early complications like injury or perforation of duodenal or gastric wall, bleeding or severe pancreatitis. All patients stayed overnight after the procedure for observation and four were discharged next day and there were no readmissions post procedure due to pain. One patient had mild pancreatitis which settled with conservative management and was discharged 3 days post procedure.

**Conclusion** EUS-RFA of PDAC with a novel monopolar RF probe was well tolerated in 7 patients. The initial results suggest that the procedure is technically relatively easy and safe

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**PWE-056** **CANCER IS THE LEADING CAUSE OF HOSPITAL DEATH IN 30 DAY MORTALITY AUDIT FOLLOWING ENDOSCOPY**

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**Introduction** Mortality post endoscopy is a quality standard for all endoscopy units. Many of the published 30 day mortality studies relate specifically to those presenting with gastro-intestinal bleeding or following a therapeutic procedure, rather than for any indication or after any endoscopic procedure.

**Methods** We reviewed all hospital deaths occurring within 30 days following any endoscopic procedure in 12 months from 1 January 2011 to 31 December 2011, at Derriford Hospital. Data was available from Clinical coding by linking the endoscopy database with the death registry. All patients' case notes were analysed and data collected including patient demographics, indications for the procedure, type of procedure, immediate post procedure complications and cause of death.

**Results** There were 13310 procedures performed (gastroscopy 6224; colonoscopy 4660; flexible sigmoidoscopy 1920; ERCP 348; other procedure 158). 146 patients died within 30 days of their endoscopy (all cause mortality 1.0%). Of these, 118 patients died in hospital (81%) and 28 patients died within the community (19%). 35/118 (30%) of hospital patients died within 7 days of the procedure. Cancer was the leading cause of hospital death, accounting for 35/118 (30%); GI Cancer accounted for 24/35 (69%) and Non GI Cancer 11/35 (31%). Other causes were pneumonia 22/118 (19%); upper GI bleeding 8/118 (7%); vascular complications 16/118 (14%). All deaths from upper GI bleeding occurred within 7 days and 12/16 (75%) deaths from vascular complications occurred after 7 days. 30 day all cause mortality rates for each procedure were: colonoscopy 0.7%; ERCP 2.2%; flexible sigmoidoscopy 0.9%; upper GI endoscopy 2%; others 1.6%. Two patients had perforated distal bowel after having had flexible sigmoidoscopy (procedure related death, 2/13,283; 0.015% or 1.5 in 10,000). There were no other procedure related deaths. Eight patients died on the same day of their procedure due to uncontrolled bleeding (n = 3), acute kidney injury (n = 1), multi-organ failure following ERCP for cholangitis (n = 1), respiratory failure (n = 2) and acute ischaemia of stomach (n = 1). There were no sedation related complications nor use of reversal agents.

**Conclusion** Deaths within 30 days following an endoscopic procedure are most likely associated with cancer or pneumonia with

procedure related or associated deaths being rare. GI cancers are twice as likely to be associated than non-GI cancers.

**Disclosure of Interest** None Declared.

**PWE-057 STENT PLACEMENT IN PALLIATIVE OESOPHAGO-GASTRIC CANCER: CHANGED PRACTICE WITH IMPROVED OUTCOMES**

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**Introduction** Oesophageal cancer is often diagnosed late in its pathological process and as a consequence management is often focussed on palliation of symptoms. The insertion of oesophageal stents tend to occur in small numbers and as such any individual endoscopist will perform only a few in a given time period. In this study we aim to establish whether by limiting this procedure to a few operators we can improve outcomes by increasing operator experience.

**Methods** This is a retrospective review of palliative stenting in patients with advanced oesophageal and oesophagogastric cancers across East and North Hertfordshire NHS Trust in the 15 month period from 1<sup>st</sup> April 2011 – 31<sup>st</sup> July 2012. We audited endoscopy reports and our prospectively maintained Upper Gastrointestinal Cancer database for any reported post procedural complications and calculated 7, 14 and 30 day mortality rate for these cohort patients. We also re-audited complications following stent insertion from March 2010–2011 where stents were performed by the first available gastroenterologists. Results were analysed according to BSG Quality indicators and compared with National Oesophagogastric cancer Audit 2010.

**Results** 20 patients had palliative stents with in this time period. The median age was 74 and male to female ratio is 3:2. 70% of cases were adenocarcinoma and 20% were Squamous cell carcinoma. The combination of pharyngeal anaesthesia and sedation were used only in 10% (n = 2) compared to 21% last year. Procedures carried under fluoroscopy guidance were 100% compared to 36% nationally. Boston Scientific Ultraflex covered metal stents were used in 95% of patients. All the stents were deployed successfully. No reported complications of stent migration (compared to 12% migration rates last year), perforation and haemorrhage post procedure. This was achieved with two gastroenterologists with special interest performing the procedure compared to five consultants last year. Our 7, 14 and 30 day mortality are as shown in the graph below.

**Conclusion** We use laser therapy first line where appropriate. This usually achieves a better dysphagia grade than stenting initially. This means that our patients have been palliated for several months before stents are inserted. Despite this patient selection seems to be appropriate as most survived more than 30 days. No complications were noted with insertion and post stent, this was a major improvement from last year's audit. From this study we have demonstrated that by treating oesophageal stent insertion as a specialist procedure, with dedicated operators we are able to minimise complication rates.

**Disclosure of Interest** None Declared.

**PWE-058 TISSUE ACQUISITION FROM SOLID PANCREATIC LESIONS – ENDOSCOPY OR SURGERY**

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**Introduction** The accurate diagnosis of solid pancreatic masses is important in directing appropriate management of patients. The

methods commonly used are percutaneous, laparoscopic and EUS guided biopsy of these lesions. Laparoscopic guided biopsy consumes theatre time and space and can be more expensive than the alternatives. In our unit; laparoscopic guided biopsy is reserved for patients who have an inconclusive result from an EUS guided biopsy or are considered for trial resection. The aim of this study was to look at the diagnostic performance of endoscopic ultrasound (EUS) guided biopsy (fine needle aspiration (FNA) or pro-core biopsy) and laparoscopic (lap) guided biopsy of solid pancreatic masses in a large HPB referral centre.

**Methods** Retrospective review of patients undergoing EUS or laparoscopic guided biopsy for solid lesions between January 2011 and March 2012. Data was obtained from a dedicated prospectively maintained database in the histopathology department. Final diagnosis was based on positive histology/cytology of pancreatic adenocarcinoma. Benign cases were followed up for a period of at least six months.

**Results** 464 specimens from the pancreas (histology + cytology including pancreatic resections) were received by the histopathology department during this period. Of these 275/464 (59%) patients had tissue biopsy of solid lesions.

These included: EUS guided biopsy = 253 and Laparoscopic guided biopsy = 22.

In the latter group; 10/22(45%) had a previous EUS of which 8/10 had an accurate diagnosis. 12/22(54%) patients went straight for laparoscopic guided biopsy. For the purposes of this study; highly suspicious and malignant samples were categorised as malignant. The accuracy, sensitivity and negative predictive value for EUS guided biopsy and laparoscopic guided biopsy were 92%/96%; 90%/94% and 74%/89% respectively. The inadequate aspirate rate was 5% and 0% respectively. There was no significant difference between the two groups. The cost of performing these procedures in our trust were: EUS guided biopsy £1094 and lap guided biopsy £ 2164.

**Conclusion** In our unit;EUS guided biopsy of solid pancreaticobiliary lesions provides high diagnostic accuracy with a low inadequate aspirate rate. Our data supports the role of EUS guided FNA as the first modality of tissue acquisition from the pancreas. Though this data also shows the cost effectiveness of EUS guided biopsy over lap guide biopsy; in units with lower diagnostic accuracy of EUS guided biopsy the cost benefit may not be realised.

**Disclosure of Interest** None Declared.

**PWE-059 SINGLE DOSE ENDOSCOPIC THROMBIN INJECTION FOR ACUTE VARICEAL BLEEDING**

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**Introduction** Endoscopic Human Thrombin injection appears a technically simple yet efficacious alternative to cyanoacrylate for gastric varices with fewer complications from studies to date, but data remains limited. We evaluated the outcomes of patients following single thrombin injection treatment for acute bleeding from oesophageal and gastric varices.

**Methods** Retrospective review of patients receiving endoscopic human thrombin injection (Tisseel Baxter Intl Inc.) for active bleeding from varices at a UK centre 2011–2012.

**Results** 15 patients (67% male, mean age 56 (SD 10)), received human thrombin injection for actively bleeding varices. Mechanism of portal hypertension was alcoholic cirrhosis in 12 patients (80%), extra-hepatic in 3 (20%). Extrahepatic portal hypertension was due to cancer, portal vein thrombosis and splenic vein thrombosis respectively. Mean MELD was 15 (SD 6). Childs grade was A, B, C in 6%, 47% and 47% respectively. Bleeding varices were identified as gastric in 13 patients (87%), oesophageal in 2 (13%). These 2 cases were not amenable to further banding due to band-induced fibrosis.