

Abstracts

Autumn Meeting Ulster Society of Gastroenterology, 10th November 2011

Hilton Hotel, Templepatrick



President Dr A Varghese
Secretary Dr P Lynch
Treasurer Dr G Caddy

PROGRAMME

Approved for 3 external CPD credits (RCP)

13:30 Registration & Tea / Coffee
14:00 Welcome & Free papers
15:30 Coffee/ exhibition stand
3:50 Modern Management of Pancreatic Cancer
Mr Mark Taylor
Consultant Hepatopancreatobiliary Surgeon, Mater Hospital
4:20 Neuroendocrine tumours: advances in their medical, surgical and radiological management
Prof Per Hellman
Dept of Surgery, University Hospital, Uppsala, Sweden
17:00 Business meeting
18:00 Meeting close & USG Dinner

ORAL PRESENTATIONS

Prize Winning Presentation:

Transient hepatic elastography reliably excludes cirrhosis in an unselected liver disease population.

Carl I, Addley J, McDougall NI, Cash WJ

Royal Victoria Hospital, Belfast Trust

Introduction: Liver biopsy has long been the gold standard to evaluate fibrosis. Unfortunately, it is invasive and associated with complications. In addition the accuracy of the histology sample is subject to significant heterogeneity. Transient elastography (Fibroscan) is a simple, non-invasive method of assessing liver fibrosis. The role of Fibroscan in unselected liver disease has not yet been established.

Aims: To assess if Fibroscan is a suitable tool to exclude cirrhosis in an unselected population of liver disease patients.

Method: All patients who underwent liver biopsy and fibroscan between May 2008 and July 2011 were included. We compared Fibroscan, AST/platelet ratio (APRI), Ultrasound and Biopsy results.

Results: 266 patients underwent fibroscan, of which 154 also underwent concurrent liver biopsy. 89 (58%) patients had a normal

Fibroscan. None of these patients had evidence of cirrhosis/severe fibrosis on liver biopsy (Ishak score ≥ 5). 4 patients had an Ishak score < 5 but definite evidence of cirrhosis on imaging in addition to abnormal fibroscan and APRI scores.

	NPV	PPV	SENS	SPEC	ACCURACY
Fibroscan	100%	25%	100%	64%	68%
APRI	95%	18%	73%	58%	59%
Ultrasound	92%	19%	38%	82%	77%
Biopsy	97%	100%	80%	100%	97%

Conclusion: Fibroscan is an excellent non-invasive tool for excluding cirrhosis. Moreover, it has identified patients in this population who have convincing evidence of cirrhosis which was under-estimated by liver biopsy. This has the biggest clinical implication in diseases where a diagnosis has been made and the disease needs to be staged to ensure screening for Hepatocellular carcinoma is not required.

Ten year data on Needle Knife Fistulotomy in a University Teaching Hospital

Tharian B, Dickey W

Altnagelvin Hospital, Londonderry

Introduction: Supra papillary needle knife fistulotomy (NKF) is a very useful, yet controversial rescue technique in cases of difficult biliary cannulation. This allows access when cannulation via the orifice cannot be achieved. Concerns have been expressed about its safety.

Aims/Background: The aim of this retrospective study was to evaluate efficacy and safety of NKF by a gastroenterologist, with experience in this technique.

Method: This was a single centre study of data from a single operator who uses NKF. A needle knife is used to enter the intramural duct clear of the orifice. The cut is then extended if necessary with a standard sphincterotome. The study was retrospective, looking at data from January 2000 to May 2011, by searching the data available on the endoscopy soft ware 'ENDOSCRIBE', patient centre, medical notes and radiology reports.

Results: A total of 2639 ERCP were done in this period, with 82.75% (2184/2639) performed by the endoscopist who uses NKF. 200 (7.5% of all and 9.1% of the operator's procedures) involved NKF. The mean age was 67.5 years.

63.5% (127/200) were women, 64% (128/200) jaundiced and 70% (140/200) had a dilated common bile duct. CBD cannulation rate

was 58% (116/200) and 80.17% (93/116) had definitive treatment. NKF was successful, in 82.9% (39/47) with choledocholithiasis and 81.25% (26/32) of strictures, with dilated ducts. 0.5% (1/200) had bleeding, mild pancreatitis in 3.5% (7/200), necrotising pancreatitis in 1% (2/200) and perforation in 1% (2/200).

Conclusion: NKF is safe and effective in the hands of an experienced endoscopist.

A retrospective study of Entonox versus intravenous sedation for patients undergoing colonoscopy

Tharian B, Ridley T, Garrett D, Dickey W, Murdock A

Endoscopy Department, Altnagelvin Area Hospital

Background Patients usually undergo colonoscopy with conscious sedation using intravenous (IV) opiate plus benzodiazepine. Recently we have offered patients the option of Entonox.

Methods This was a retrospective study from June 2010 to June 2011. A total of 2870 colonoscopies were performed. The data was obtained from Endoscribe and comfort scores were obtained from the endoscopy register. Statistical analysis used chi-square with Yates' correction and $p < 0.05$ as significant.

Results 149 patients (5.2%) opted to have no sedation and 50 (4.5%) of 1119 patients who opted for Entonox subsequently required IV sedation and were excluded. Of the remaining, 1069 (40.0%) patients chose to have Entonox, and 1602 (60.0%) patients IV sedation. Of 1472 women included, 542 (36.8%) opted for Entonox and 930 (63.2%) for IV sedation, compared with 527 (44.0%) and 672 (56.0%) of 1199 men ($p < 0.001$). Colonoscopy was complete to the caecum in 1013 (94.8%) of patients given Entonox and 1501 (93.7%) receiving IV sedation ($p = 0.288$). Ileal intubation was achieved in 511 (47.8%) of the Entonox group vs. 957 (59.7%) of the sedated group ($p < 0.001$). Polyps were seen in 264 (24.7%) of the Entonox group vs. 397 (24.8%) receiving IV sedation ($p = 0.997$). 974 (91.1%) patients given Entonox were given a high comfort score of 1 or 2 compared with 1436 (89.6%) patients receiving IV sedation ($p = 0.233$).

Conclusion Entonox is a safe and effective method of sedation with comfort scores and completion rate to the caecum comparable to IV sedation. However, significantly fewer women choose Entonox for conscious sedation.

Is unsedated colonoscopy the way forward?

Addley J, Kalansooriya V, Johnston S, Mitchell RM, Mainie I

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Introduction Colonoscopy is a very common procedure with several diagnostic and therapeutic uses. Although widely available and successful unsedated colonoscopy remains underused.

Method A retrospective analysis was carried out to identify patients attending Belfast City Hospital having unsedated outpatient colonoscopy from September 1st 2009 to December 31st 2010. A proforma was completed with details relating to demographics, seniority of endoscopist, presence of a trainee, reason for referral, outcome of procedure, interventions required and any subsequent complications noted. 87 of the 244 patients during the period September 2010 to December 2010 were analyzed further with respect to comfort scores.

Results 244 patients had unsedated colonoscopies (68 female and 176 male) with a median age of 60.6 years. The completion rate was 96% with an average completion time of 22 minutes. Of those assessed with respect to comfort (36%), the majority of comfort scores (78%) were at levels 1 and 2 (high levels of comfort).

Discussion An increasing number of unsedated colonoscopies are being performed successfully in our unit with high completion rates and satisfactory comfort scores.

Conclusion A heightened awareness of the availability of unsedated colonoscopy is required- it should be offered to all suitable patients who can make an informed decision based on appropriate pre-procedure counseling and education in the setting of a colonoscopist who has the appropriate expertise to carry out the procedure without sedation.

Laparoscopic colorectal surgery experience in a single centre

Jones C, Smyth SC, Dooher M, Lee J, Armstrong A

Department of Surgery, Belfast City Hospital, Belfast

Introduction Laparoscopic resection has significant benefits over open surgery for colorectal patients. This study aimed to compare outcomes for laparoscopic and open colorectal resection in a single centre.

Patients and Methods A retrospective review, of all patients who underwent open or laparoscopic colorectal surgery, for benign or malignant disease, from July 2006 to August 2009, was performed. Patient demographics, operation details, length of stay and histology were collected. Results were expressed as median (IQR). Continuous variables were compared using Mann Whitney U test and proportional analysis by Chi squared test. A p value of < 0.05 was considered significant.

Results 199 (103 male) patients were included. 115 operations were performed laparoscopically (22 converted). Age was similar in the open group (65.4 vs. 65.1 years; $p = 0.94$). Laparoscopic approach was more frequent in elective patients and open in emergencies ($p < 0.0001$). By intention-to-treat analysis, the length of stay (LoS) was lower after laparoscopic surgery (7.0 days (5.0-10.8) vs. 10.0 days (7.0-20.5); $p < 0.0001$). After conversion, LoS was 9.5 days (7.0-15.5), similar to open ($p = 0.56$). In colorectal cancer patients, 70.4% underwent laparoscopic surgery. The T stage was similar ($p = 0.77$) but there was a higher N stage ($p = 0.01$) in open group. Number of nodes harvested respectively was similar (18.0 vs. 16.0; $p = 0.52$) as was resection margin (15.0 vs. 15.0; $p = 0.21$).

Conclusions This study demonstrates laparoscopic colorectal surgery is routinely performed in the elective setting with acceptable conversion rates, with an overall reduction in hospital stay. In colorectal cancer, laparoscopic surgery provides an adequate oncological resection.

Redefining resection margins in pancreatic surgery

Jones C, Badger SA, Verma M, Diamond T, Taylor MA, McKie LD, Loughrey M

1 Department of HPB Surgery, Mater Hospital, Belfast HSCT, 2 Department of Pathology, Royal Victoria Hospital, Belfast HSCT

Introduction A British Society of Gastroenterology survey of pathologists found a range of practice for reporting of Whipples

specimens, and therefore a greater need for conformity. As a result, R0 and R1 resection margins have been redefined. The aim of the study was to determine this effect on histological results.

Patients and methods The new protocol was introduced incrementally in 2007. The pathology reports of all patients who underwent Whipples resection between 2004 and 2006 (Group 1) were compared to those in 2008 to 2010 (Group 2). Results are expressed as median (IQR) and comparison between groups using Chi squared test.

Results 34 patients were in Group 1 and 53 in Group 2. They had similar age (59.0 vs. 64.0 years; $p=0.08$) with larger tumours in Group 2 (25.0 vs. 30.0mm; $p=0.19$). Most tumours were in the head of pancreas in both groups, with adenocarcinoma being the predominant type. R0 resection was achieved in 19 of 34 (55.9%) patients in Group 1, compared to 24 of 53 (45.3%) patients in Group 2 ($p=0.46$). This difference was most noticeable in head of pancreas tumours (57.1% vs. 29.6%; $p=0.42$). The distribution of T stages was similar between groups ($p=0.41$). Although the average number of resected lymph nodes remained steady ($p=0.80$), the proportion of involved nodes increased $p=0.004$.

Conclusion The new protocol has resulted in a higher rate of detection of disease in lymph nodes and resection margins. Further studies are however required to assess the implications on prognosis and overall survival.

A comparison of short-term outcomes following standard and extralevator abdominoperineal resections for low rectal cancer

Bell Z, Loughlin P, Gilliland R, McCallion K, McAllister I

Ulster Hospital, Dundonald

INTRODUCTION Extralevator abdominoperineal resection (APR) is currently suggested to be an oncologically superior surgical approach for low rectal cancer. This study compared early short-term results for this procedure with those obtained by a conventional operation.

METHODS Clinical and pathological data were collected retrospectively on 93 consecutive standard APRs performed by 5 colorectal surgeons between 2004 and 2011. These were compared with the first 23 extralevator excisions carried out by 2 of the surgeons who adopted the new technique during the study period.

RESULTS There was no statistical difference between the groups in terms of pre-operative staging, tumour site, neoadjuvant therapy and pathological staging. Patients were more likely to have involvement of the circumferential margin (CRM) if the tumour was pT3 ($p=0.02$), pT4 ($p=0.001$) or pN2 ($p<0.001$). Extralevator APR resulted in a reduction in CRM involvement (from 27.2 to

13%; $p=0.19$) and intra-operative perforation (from 15.2 to 0%; $p=0.07$) compared with standard surgery. However extralevator excision was associated with a significant increase in perineal wound complications (from 16.3 to 26%; $p=0.045$).

DISCUSSION This study supports current evidence that rates of IOP and CRM for low rectal cancer surgery can be improved by an extralevator approach. Indeed, although statistical significance was not achieved with the small sample size, CRM involvement was halved in this patient cohort.

Endoscopic Surveillance for Barrett's Oesophagus: a Population-Based Study of Surveillance Practice and Outcomes

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Background: Barrett's oesophagus (BO) is the precursor to oesophageal adenocarcinoma (OAC). Endoscopic surveillance of BO is recommended in order to detect early OAC. Few studies have examined surveillance practice and clinically relevant outcomes. Our aim was to describe endoscopic surveillance practice in a large cohort of BO patients.

Methods: A standardised review of hospital records was conducted on 3,167 BO patients from the Northern Ireland Barrett's oesophagus register. Data were collected relating to entry into surveillance, and any subsequent endoscopies. Follow up for malignancy or death was conducted through matching with records from the Northern Ireland Cancer registry.

Results: The majority of patients (1975 of 3167; 62.8%) were entered into surveillance at BO diagnosis. There were 117 patients that subsequently progressed to malignancy (cancer or high grade dysplasia). Patients entered into surveillance were more likely to be male (65.8% vs 56.9%; $p<0.001$) and younger (mean age 59.9 vs 67.3 years; $p<0.001$) than those not entered. Patients with the lowest co-morbidity scores were more likely to be entered into surveillance than those with higher co-morbidity scores ($p<0.001$). Entry into surveillance was associated with higher surgical resection rates for OAC, and improved all cause survival (adjusted relative risk of death 0.66 (95% CI 0.56-0.77)).

Conclusions: This population based study of surveillance practice has shown that age, sex and comorbidity are significant factors associated with entry into surveillance. Although surveillance was associated with higher surgical resection rates and improved survival, selection bias is likely to account for a large proportion of these differences.