Endoscopy

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Search strategy: All sessions/abstracts were reviewed if related in any way to endoscopy

Themes to be covered
- Colonoscopy
- EUS
- ERCP
- EMR/ESD
- Pediatrics
COLONOSCOPY ... aka polyps, polyps, polyps

New equipment at DDW

• self propelled scope (But there is a 55 minute cecal intubation time...)

• viewing behind folds with larger field of view (330 degrees vs 170)
Comparing Traditional Forward-Viewing Colonoscopy With “Full Spectrum Endoscopy”: a Randomized, Multicenter Tandem Colonoscopy Study – the Fuse Study

Multicenter RCT study, 185 patients. same day back to back tandem colonoscopies primary end point = adenoma miss rates study groups similar cecal intubation rates, cecum intubation time, withdrawal time

<table>
<thead>
<tr>
<th>Mode</th>
<th>Miss Rate</th>
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<tbody>
<tr>
<td>Forward view colonscope</td>
<td>41.7% (20/48)</td>
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<tr>
<td>vs.</td>
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<tr>
<td>Full spectrum colonoscope</td>
<td>7.6% (5/68)</td>
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COLONOSCOPY “accessories”

• (NOT AT DDW) Lifting polyps is a useful technique
  • saline + indigo carmine + epinephrine
  • use a short needle (e.g. 3 mm, 25 gauge) as opposed to a long fat sclerotherapy needle (7 mm, 23 gauge)

• Watch for this in the future...
  • submucosal lifting gel for complex polyps.. (see ESD section)
    • multiple studies in ESD sections
COLONOSCOPY... aka polyps, polyps, polyps

Also Not at DDW..

Colonoscopy training in Canada is going to improve Skills Enhancement in Endoscopy (SEE program - CAG)
COLONOSCOPY “Quality issues”
sedation safety (more sedation -> Masking pain)
(propofol / narcotics / benzodiazepines)

Safety and Risk Factors for Procedural Sedation in the 21st Century: a Review of Over 2 Million Patients From 2000-2011 8:00 | Sa1450

over 2.1 million patients across 11 years

CPR use stable over time
less use of reversal agents
18 EGD deaths > 8 Cscope deaths.

older age, higher ASA classifications, narcotic administration, trainee involvement, certain non-screening indications, and presence of AP for EGD procedures are associated with increased risk of serious events.
COLONSCOPY “Quality issues”
bowel preparation regimens and timing

multiple abstracts

through scope rapid prep (eg. for R colon) an interesting idea but.. was presented at DDW in 2011
COLONOSCOPY - Polyp identification

PIVI statement (optical histology theme - ASGE PIVI statement

Multiple abstracts

• training for polyp recognition

• standard vs. HD vs wavelength issues (NBI, I-scan, etc) vs OCT...

• water insufflation (subgroups eg training residents, etc)

My takehome messages for you...

Familiarize yourself with polyp classification systems (pit pattern, Paris, etc).

Take your time, use good tip control and look meticulously
Measure your performance
COLONOSCOPY...

Cold SNARE Polypectomy Versus Cold Forceps Polypectomy Using Double Biopsy Technique for Removal of Diminutive Colorectal Polyps: a Prospective Randomized Controlled Trial

RCT
117 polyps (1-5 mm, mean 3.6 mm)
cold snare polypectomy vs cold forceps polypectomy with double bx technique with large capacity forceps
tow or more additional biopsies taken from the base and edges of the polypectomy site

complete visual and histological resection rate were higher with cold snare incomplete polypectomy rate in the study with cold biopsy was 24.1% (was 6.8% with cold snare!)
COLONOSCOPY...

Polypectomy
standardized training UK DOPSy

The Impact of the Introduction of Formalized Polypectomy Assessment on Training in the United Kingdom 8:00 | Tu1411

Interval cancers are an important outcome that should be measured! Are you measuring your quality measures?
EUS

New equipment
• forward viewing EUS that can be used to stage CRC
• cecal intubation...

On site cytopathology (the debate rages on..)

Clinical Impact of Immediate on-Site Cytopathology (CyP) Evaluation During Endoscopic Ultrasound-Guided Fine Needle Aspiration (EUS-FNA) of Pancreatic Mass: Interim Analysis of a Multicenter Randomized Controlled Trial
EUS

Accessories

FNA Needle selection (the needle wars...)
• 19 vs 22 vs 25... needle types

• Innovative uses of FNA needles
• through needle biopsy forceps of chronic pancreatitis
EUS

Pseudocyst drainage by EUS is safe and effective

• plastic vs plastic + nasobiliary drain
• plastic vs metal
• necrosectomy
  Hydrogen peroxide
Pancreatic cysts are still a popular study subject in EUS

Sendai criteria (conflicting results in validation studies re malignancy prediction
  Intraductal papillary mucinous tumors

Using computer algorithms to improve pancreatic cancer detection in chronic pancreatitis
ERCP

Equipment / Accessories
cholangioscope related studies
bx vs FISH
ultrathin scope with anchoring balloon

Quality data [The diagnostic ERCP is a dying breed]
no benefit from CO2 on pain
ERCP

Complications
PEP (post ERCP pancreatitis)
  rectal NSAIDs as prophylaxis
  pancreatic stents (optimizing length of PD stents)

Training
  resident structured assessment
  learning curve data
ERCP

Cannulation technique
failed cannulation
Pancreatic duct guidewire or not?

Can Early Double Guidewire Technique Facilitate Common Bile Duct Cannulation and Reduce Post ERCP Pancreatitis? - Results of a Multicenter Prospective Randomized Controlled Trial:

precut techniques

Endoscopic mgm of cholecystitis

SOD multicentre data
interim analysis data
Neodymium Magnet Adult Desk Toys Are Associated With Increased Medical and Surgical Intervention in Children
ESD/EMR

Barrett’s ++++

Techniques to shorten duration of ESD
submucosal gel (autodissection)

The principle is that submucosal lifting improves safety of dissection
• decreased perforation
• control of blood vessels prior to bleeding
• autodissection
• main downside to ESD is training requirements and length of procedure
There is a lot of endoscopy at DDW...
Thank you!