Endoscopic Stent Placement

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Esophageal stents

- Self-expandable metal – partially covered
- Self-expandable metal – fully covered
- Self-expandable plastic
Esophageal stents: Indications

- Palliation of dysphagia
- Palliation of malignant esophageal fistulae
- ? Bridge to surgery
Esophageal stents: Timing of Placement

- As an adjunct to chemoradiation - ? Placement of removable stent as a bridge to palliation and avoid long-term stent complications
- Concomitant stent and chemoradiation NOT associated with poor outcome
- As a bridge to surgery – while receiving chemoradiation
Esophageal stents: complications

- Migration
- Tracheoesophageal fistula
- Erosion into blood vessels – bleeding
- Obstruction from granulation tissue
- Food impaction
Esophageal stents: plastic vs. metal

- Equal palliation
- Migration rate higher with plastic
- Plastic easily removable if designed for temporary use

Stent placement: Location

- **Cervical**
  - Smaller diameter preferable
  - Foreign body sensation

- **GEJ**
  - Larger diameter preferable
  - Higher migration rate than other locations
  - Gastroesophageal reflux, aspiration
  - ? Anti-reflux stent
Duodenal stents

- Indication – palliation of malignant gastric outlet obstruction
- Outcome for palliation appears to be better than palliative gastric bypass in poor operative candidates
- Sent placement tends to occur late in relation to disease course and patients have limited
Duodenal stents

- Benefits of newer duodenal stents
  - Flexibility
  - Rounded ends

- Need for metal biliary stent placement prior to duodenal stent placement
  - Usually biliary stent already present
  - If not, evidence of ductal dilation and abnormal liver enzymes portends later obstruction with pancreatic head cancer
Colonic stents: Malignant Indications

- Palliation of malignant colorectal obstruction
- Pre-operative placement in left sided disease for decompression and one-stage surgery
Colonic stents: Benign Indications

- Bride to surgery in obstruction
- Use for post-operative complications: fistula or stricture
  - High migration rates with covered stents
  - Case reports only
  - Uncovered stents – lack of removability
Colonic stents: Right Sided Disease

- Success rate and outcomes appear to be comparable to left sided placement

Colonic stents: Complications

- Delayed perforation – closure of Dutch in stent study – palliation
  

- Migration – uncommon with newer stents and proper patient selection