"From the Trough"

Perioperative Interest Group Notes

The imperfect opinions in these reports are only meant to stimulate discussion: - they should not be considered a definitive statement of appropriate standards of care.

Date 1/6/23

TOPIC 1:

84 yo lady for gastroscopy and colonoscopy

Background

- CVA – presumed cardioembolic
- PAF – DOAC
- Fe deficiency anaemia – chronic
    - AV malformation in small bowel
    - Managed with iron infusions
- CKD – stage 1
- Intracerebral aneurysm – under surveillance
- IHD – stented

Issues

- Melaena and anaemia – DOAC for CVA. Hb drop from 112 to 53.
- Previous gas/colon showed healed antral ulcer.
    - Complicated by hypotension. Treated IVF and vasopressors.
    - Required ICU for fluid overload.
    - Patient doesn't want to have procedure – worried about having further cardiac failure, stroke, and ICU admission.
    - Patient concerns reasonable, unclear cause of previous event

Discussion

Proceed to surgery?

- Reasonable to proceed to gastroscopy –
    - low risk for fluid overload.
- Colonoscopy - indication unclear
- More fluid shifts involved.
- RFA indication for colonoscopy states haemorrhoids
    - Consider less invasive investigations? Eg. proctoscopy/flexible sigmoidoscopy

Plan

- Proceed with gastroscopy only at this stage – avoid bowel prep and significant fluid shifts
- Liaise with surgical team regarding colocoscopy

TOPIC 2: Dysautonomia of uncertain aetiology

29F with cerebral palsy for revision of baclofen pump

Background:

- Cerebral palsy
  - Non-verbal
  - Mobilises with electric wheelchair, requires a carer to operate
  - Severe spasticity and contractures involving all four limbs
  - Significant scoliosis and restrictive lung disease
  - Gastrostomy tube for feeding
  - Central sleep disordered breathing?
    - Abnormal breathing pattern – crescendo/decrescendo pattern
    - Assumed to have significant restrictive lung disease. No formal spirometry
    - Recent overnight oximetry showed SaO2 maintained >90%

Issues:

- >1 year of episodic flushing, diaphoresis, tachycardia, tachypnoea
  - Autonomic dysfunction?
  - Variable severity and duration of symptoms
  - Baseline tachycardia 110bpm (previous HR 100 so may be chronic)
- Differentials include:
  - Central dysautonomia – potential syrinx development given cerebral pathophysiology
  - Hyperthyroidism
  - Phaeochromotcytoma
  - Baclofen withdrawal due to malfunctioning pump
  - Pain and Anxiety component?
  - Atropine - PO secretions, episodes don't appear to correlate with dose
  - Subclinical seizure activity

Discussion:

Perioperative Optimisation

- Exclude hyperthyroidism and pheochromocytoma preoperatively
- Co-ordinating investigations while under GA
  - MRI – can be performed safely with baclofen pump?
  - Discussed with rehabilitation physician - all baclofen pumps are MRI compatible, however, the magnetic field and associated increased temperature can cause the pump to malfunction. See article: *doi: 10.1016/j.bjae.2019.11.002*

- Consider change atropine to glycopyrrolate

Plan:

- Pathology testing for TFT's, plasma, and urine catecholamines
- Consider MRI under GA
- Discuss with treating teams – can we perform any further investigations while under GA/inpatient

TOPIC 3:

84F for microlaryngoscopy and VC injection for unilateral vocal cord palsy

Background:

- Bowel Adenocarcinoma - recent diagnosis, awaiting surgical review
- Vocal cord palsy – Idiopathic

- frequent botox injections
- Nasendoscopy – nil else significant

Discussion:

Proceed to Surgery?

- Vocal cord usually moves over time, leading to resolution of vocal changes
- Indication is prevention of aspiration
- Surgery may not be required if symptoms improved
- Nil recent aspiration events
- Possibility of further surgical procedures for bowel adenocarcinoma - risk of ongoing aspirations?
- ENT discussion – happy to cancel, states likely no complications from not proceeding.
- Informed consent process – patient happy not to proceed at this time

Plan:

- Procedure was cancelled

TOPIC 4:

70F severe rheumatoid arthritis with unstable C-spine deformity requiring fixation from cervical to thoracic spine

Background

- RA
  - Weekly MTX + prednisone 7.5mg OD
- Distance patient
- Unsupported at home, IADLs

Issues:

- Lower neck instability - Progressive
- Previous C-spine fixation – uneventful AFOI
  - Post-op infected hardware requiring removal/replacement
  - McGrath+ bougie – no airway issues documented
  - ICU admission post-operatively
- Severe respiratory disease – bronchiectasis and severe pHTN
  - Puffers, saline nebs – productive of 100ml sputum everyday post saline nebuliser
  - Weekly percussion Physiotherapy – patient feels very beneficial for sputum clearance
  - Stable disease, home O2 not indicated

Discussion

Perioperative optimisation

- Cardiology and respiratory review in last 6/12 – nil optimisation required
- Prehabiliation – benefits of perioperative physiotherapy and secretion management?
  - postural drainage has minimal evidence base, percussion has better evidence if high sputum load, oscillatory PEP is most useful. Increasing use, in CF population

Conduct of anaesthesia

- AFOI vs asleep FOI - uneventful intubation post insertion of original hardware
- However, has had further hardware since and now an unstable neck
- Patient not assessed clinically – difficult to ascertain what is required until face-to-face review

Plan:

- Proceed to surgery
- Dr Mackney has organized extra perioperative physiotherapy sessions close to patients home
- Patient will attend outpatient PT here for 2 days leading up to admission