Palliative Emergencies

Ken Stakiw
Disclosure

- None to disclose for this lecture
- Have received honoraria from a number of agencies and companies previously
- Intend to discuss some “off label” use of medications
- I will indicate personal approaches and experiences
Palliative Emergency

• In most medical specialties emergencies are those situations which if left untreated will immediately threaten life.

• In Palliative Care where death is often an expected outcome emergencies are those conditions which if left untreated will seriously threaten the quality of life
Palliative Emergencies

• Seizures
• Pain Crises
• Acute Dyspnea
• Spinal Cord Compression
• Hypercalcemia
• Superior Vena Cava Obstruction
• Haemorrhage
Seizures
Objectives

• To assess and manage seizures including Status Epilepticus
P.H.

- 58 yr. old with metastatic Prostate cancer
- Admitted to hospital with weakness, severe pain, and trouble with vision esp. L eye associated with L sided facial weakness
- Mets. to many bones
P.H.

- Had hormonal resistant prostate cancer and chose not to have any further therapy except comfort measures
- Initial therapy targetted to pain control
P.H.

- Admitted Nov. 15
- Nov. 25 had generalized seizure
- Versed 5 mg. s.c. – seizure activity stopped but he remained very agitated
- Versed 2 mg. repeated q 5 min. until agitated behaviour stopped—total of 8 mg.
P.H.

• Dilantin 300 mg po initiated
• Serum blood levels monitored – dose increased to 500 mg. od
• Nov. 30 further seizure – managed with versed 5 mg. s.c.
• Therapeutic levels of Dilantin could not be achieved in spite of increase to 700 mg./day
P.H.

- No further seizures but switched to Keppra
- Gradual deterioration died Jan.9
Seizures

- **Generalized** usually with loss of consciousness
- **Partial** may also be associated with loss of consciousness
- **Status Epilepticus** – Persistent Seizure activity for 30 min. or recurrent seizures without regaining consciousness
Seizure Treatment

- Usually in bed if not recovery position (once seizure is over)
- remove objects that may injure
Seizure Treatment

• Medications
  – **Midazolam (Versed)** 2.5 - 5 mg. s.c. may be repeated q 5 min. until seizure stops
  – **Lorazepam (Ativan)** 2 mg. s.c. or i.v. repeat in 10 min.
  – **Diazepam (Valium)** rectal solution 10mg.
Status Epilepticus

- Midazolam (Versed) for Continuous Seizure after 2 doses of 5 mg. - 5 min. apart
  - 10 mg. s.c. then continuous s.c. infusion beginning at 1 mg./hour increasing by 1 mg./hr. (may need repeat Versed bolus of 5-10 mg.
  - If possible start i.v. for drug administration
Pain Crises

Objective

• To assess and manage pain crises
R.O.

- 67 year old male
- Metastatic colon cancer to bones, liver, and lungs
- Severe pain in pelvic bones and R ribs
- Seen as outpatient and had his opioids titrated to manage pain
R.O.

- Admitted to hospital some time later with very severe pain 10/10 mainly back
- Meds - Hydromorph contin 60 mg. bid and hydromorph 8 mg. q1h prn (took 8 doses per day previous 3 days) now in addition to pain has nausea, vomiting, and confusion
- What do you do?
Pain Crises

• Cause?
• Review med list
  – PIP
  – Family
  – Pharmacist
  – Nurse
Pain Crises Management

• “Stacking”
  – Single
  – Double
Remember

- Parenteral (injectable) *2X* the strength of oral route i.e. injectable dose = oral dose divided by 2
Tmax

- Tmax after
  - PO (approx.) 1 hr.
  - SC, IM (approx.) 30 min.
  - IV (approx.) 6 min.
Practicality

• When using immediate release preparations for breakthrough pain
  – Orally dose q1h
  – S.c. dose q30 min.
  – I.v. dose q 6-10 min.
R.O.

- Issue pain crisis – needs immediate attention
- 184 mg. po = 92 mg. s.c. / i.v.
- Usual breakthrough dose is 10% of daily dose – 9 mg.
• Single Stacking
  – 8 mg. s.c. q 30 min.
  – 8 mg. i. v. q10 -15 min.

• Double Stacking
  – 8 mg. s.c. start –16 mg. in 30 min.
  – 8 mg. i.v. start – 16 mg. in 10 – 15 min.
Acute Titration

- Can redose at Tmax if pain persists
- If pain moderate to severe could increase dose by 50 – 100%
- Pain is usually controlled within 2-3 doses
Acute Dyspnea

• Assess and manage acute dyspnea
N.W.

- 78 year old F diagnosed with lung cancer 2010
- Non operable managed with chemo. and radiation (chemo caused severe nausea and vomiting so d/c)
- Noted to have recurrence 2011 – one further attempt with chemo—Tarceva but ineffective
N.W.

- Presented to hospital with severe dyspnea
N.W.

- Current med. at home hydromorph contin 9 mg. bid
- Hydromorph 2 mg. q1h prn for breakthrough
N.W.

- Mottled cyanotic obviously gasping and very frightened
- “How long do I have”
N.W.

• Started on hydromorph 0.5 mg. s.c. and Versed 0.25 mg. q4h with the same dose q1h prn
N.W.

- The next day sitting up eating and talking
Dyspnea

• The awareness of uncomfortable breathing
• Complex **Subjective Symptom**
• May be influenced by psychosocial and spiritual factors
Dyspnea

• Patient’s assessment of their dyspnea is most reliable
• Clinical signs don’t always correlate with the respiratory experience
• Not necessarily related to resp. rate nor O2 sat.
Dyspnea - causes

- Pulmonary
  - Airway obstruction, pleural effusion, COPD, Lymphangitic carcinomatosis, pneumonia, pulmonary embolism
- Cardiac
  - CHF, Pericardial effusion
- Systemic causes
  - Anemia
Dyspnea causes

• Muscle weakness
  – ALS, Cachexia

• Other
  – Ascites

• Psychological
Dyspnea management

• Identify and treat underlying causes if possible
• Treat Symptom
• Always communicate with family and patient
Dyspnea management
Non pharmacological

- Avoid exacerbation activities and conserve energy
- Normalize emotional responses
- Fan
- Position: lean forward, head up
- Limit people in room
- Reduce temperature and humidity
Non pharmacological

- Open window and allow to see outside
- Avoid irritants e.g. smoke strong scents
- Relaxation therapy
Oxygen in Dyspnea

• In hypoxemic patients oxygen improves tissue hypoxia reducing ventilatory drive, pulmonary vascular resistance and peripheral vascular resistance
• Oxygen is often recommended for dyspnea
• When PaO$_2$>55 results conflicting
Oxygen

- International randomized controlled trial
- Oxygen vs. medical air
- Results: Palliative Oxygen does not appear to confer any additional benefit over medical air for relieving dyspnea or improving quality of life
Pharmacological

- Morphine – backed by evidence
  - Safe and effective
  - Opioid naïve – 5 mg. q6h p.o. or 2.5 mg. s.c.
  - Q6h
  May use long acting
Nebulized no systemic benefit
Pharmacological

• Other opioids - no randomized data but anectodal effectiveness
Pharmacological

• Inhaled furosemide
  – Studies show symptomatic benefit for 1 - 4 hrs.
Pharmacological

• Benzodiazepines
  – Recent study compared morphine to midazolam- also used in combination
  – Combo provided greatest relief
  – Morphine and midazolam equally effective
Pharmacological

• Psychotropic drugs useful as anxiety plays large role
  – Methotrimeprazine 5 - 10 mg. b-tid

• Steroids

• Bronchodilators
Pharmacological

- Triple neb. Mix
  - Morphine (inj.) 5 mg. Decadron (inj.) 4 mg. Salbutamol (neb.) 2.5 mg. nebulized q 2-3 h. prn
  - Oral rinse with water following
  - Effective anecdotally for dypnea and cough