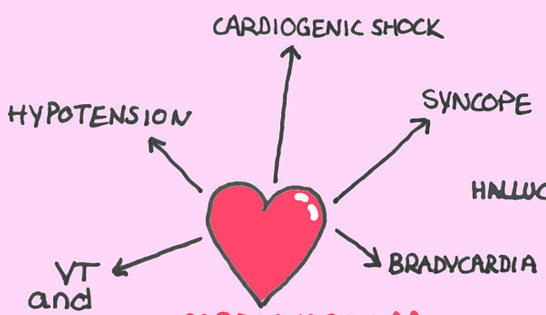
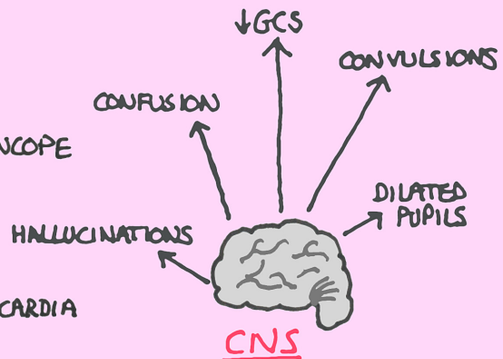
β-BLOCKER O.D.

Dr. Pandora Spilman-Henham @pandoraspilman

EFFECTS

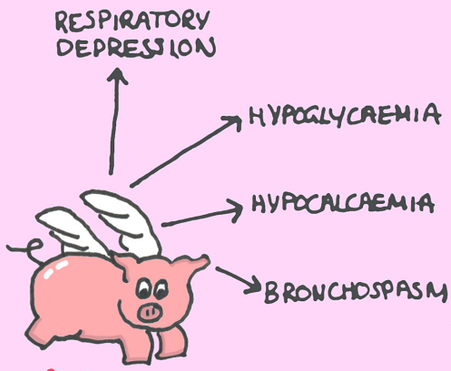


CARDIOVASCULAR



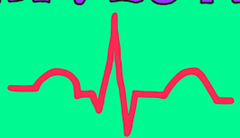
CNS

* Lipid soluble β blockers are more likely to cross BBB *



RARE EFFECTS

INVESTIGATIONS



ECG

- ↑QRS
  - propanolol
  - due to Na^+ channel blockade
- ↑QT
  - sotalol
  - due to K^+ channel blockade

BLOODS

- blood gas
- U+Es
- FBC
- Ca^{2+}
- blood glucose
- CK (if pt is unconcious)

OBSERVATION

- 6 hrs
- 12hrs if sustained release preperation

APPROACH

- maintain AIRWAY and BREATHING in unconcious patients
  - ↳ consider early intubation
- If CARDIAC ARREST occurs, resusitation should be PROLONGED
- consider ACTIVATED CHARCOAL if patient presents within 1 HOUR of ingestion
- In SYMPTOMATIC patients or those with ECG CHANGES consider early discussion with ITU.

MANAGEMENT

HYPOTENSION

FLUIDS

- patients with fluid resistant hypotension can deteriorate quickly

GLUCAGON

- bolus dose = 5-10mg IV over 1-2mins
- Infusion = 50-150 mcg/kg/hr

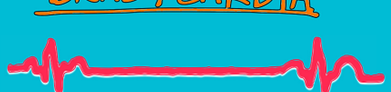
HIGH DOSE INSULIN/DEXTROSE

- Improves myocardial contractility
- monitor for ↓glucose + ↓K^+
- consult toxbase for dosing

LIPID EMULSION

- In RESISTANT cardiotoxicity
- 1.5 ml/kg 20% Intralipid bolus
  - ↳ can be repeated 1-2 times
- Infusion = 0.25-0.5 ml/kg/min over 30-60 mins
  - ↳ max = 500ml

BRADYCARDIA



- ATROPINE = 0.5-1.2mg
- consider dobutamine or isoprenaline
- temporary pacing may be required.

BRONCHOSPASM

- bronchodilators
- steroids

CONVULSIONS

- single, short seizures do not require treatment
- If PROLONGED or FREQUENT give LORAZEPAM 4mg IV
- 2nd line = BARBITURATES
  - ↳ AVOID phenytoin as it can worsen cardiotoxic features

↓pH METABOLIC ACIDOSIS

- consider IV SODIUM BICARBONATE if acidosis persists after fluid resusitation and correction of hypoxia
- correct rapidly if QRS prolonged
- dose = 50 mmol

concentration	volume (ml)
1.26%	333
1.4%	300
* 4.2%	100
* 8.4%	50

* 4.2% + 8.4% via central access

#EM3