Decision tree for nasogastric tube placement checks in **Adults**

- Estimate NEX measurement (Place exit port of tube at tip of nose. Extend tube to earlobe, and then to xiphisternum.
- Insert fully radio-opaque nasogastric tube for feeding (follow manufacturer’s instructions for insertion)
- Confirm and document secured NEX measurement
- Aspirate with a syringe using gentle suction

**Aspirate obtained?**

**YES**

Try each of these techniques to help gain aspirate:
- If possible, turn adult onto left side
- Inject 10-20ml air into the tube using a 50ml syringe
- Wait for 15-30 minutes before aspirating again
- Advance or withdraw tube by 10-20cm
- Give mouth care to patients who are nil by mouth (stimulates gastric secretion of acid)
- Do not use water to flush

Test aspirate on CE marked pH indicator paper for use on human gastric aspirate

- pH between 1 and 5.5
- pH NOT between 1 and 5.5

**PROCEED TO FEED or USE TUBE**

- Record result in notes and subsequently on bedside documentation before each feed/medication/flush.

**Aspirate obtained?**

**YES**

Proceed to x-ray: ensure reason for x-ray documented on request form

**NO**

Competent clinician (with evidence of training) to document confirmation of nasogastric tube position in stomach

**DO NOT FEED or USE TUBE**

Consider re-siting tube or call for senior advice

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A pH of between 1 and 5.5 is reliable confirmation that the tube is not in the lung, however it does not confirm gastric placement as there is a small chance the tube tip may sit in the oesophagus where it carries a higher risk of aspiration. If this is any concern, the patient should proceed to x-ray in order to confirm tube position.

Where pH readings fall between 5 and 6 it is recommended that a second competent person checks the reading or retests.

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