Holy Cross Hospital

Who we are?

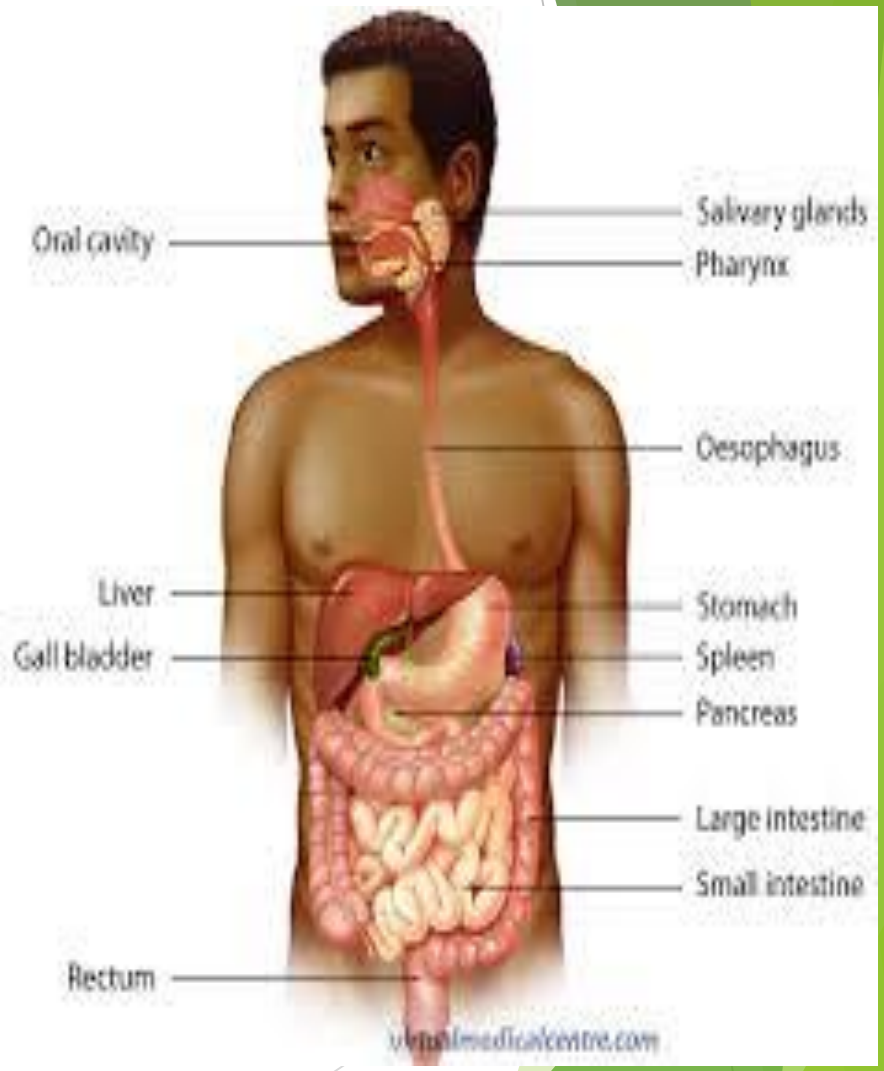
- 40 bedded hospital
- Clinical emphasis is on managing severe disability and long-term conditions
- Integrated MDT working together to provide the best possible care
- Patients with oropharyngeal dysphagia often have a combination of enteral (PEG tube feeds and modified oral food and fluid)

Introduction

- Definition of dysphagia (swallowing disorder)
- Description of the normal swallowing process
- Causes of dysphagia
- The assessment process
- Management

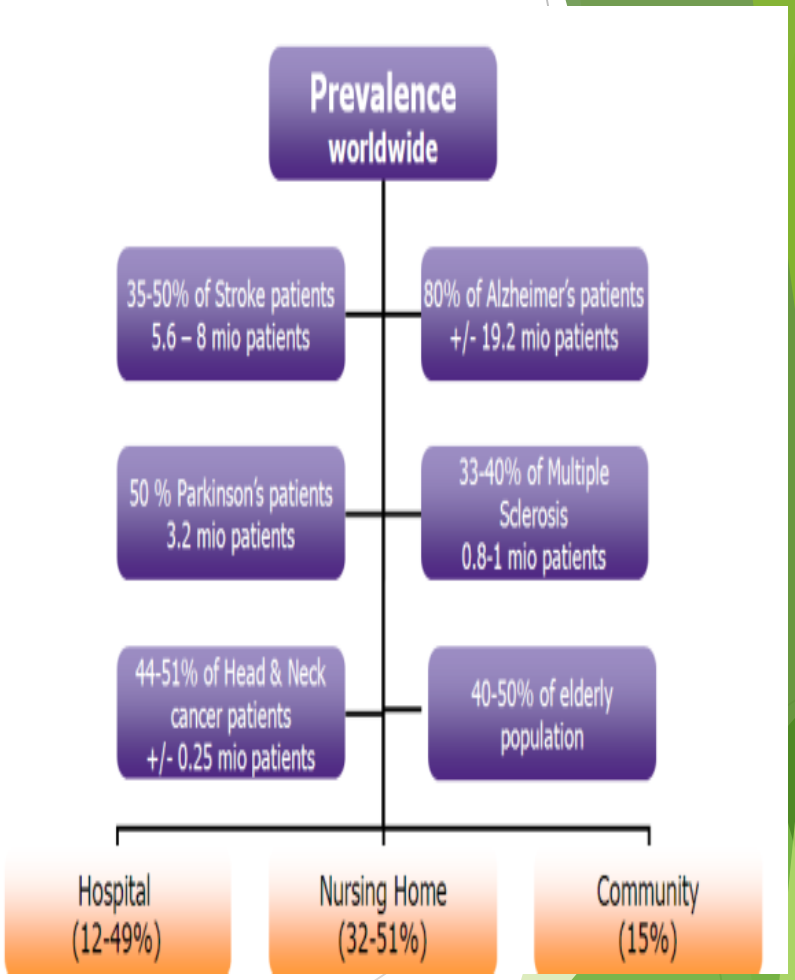
Swallowing Disorders Definition

- Dysphagia is a symptom and not a disease
- Dysphagia describes difficulty chewing and swallowing food or drinking fluid (dys= difficulty, phagia = eat)
- Difficulties can arise anywhere along the alimentary tract
- Can be temporary or permanent
- Can range from mild severity to profound severity
- Recent studies demonstrate that the swallowing pattern alters with age



Swallowing Disorders
Causes

- Neurogenic
  - Traumatic Brain Injury
  - Stroke
  - Motor Neurone Disease
  - Polymyositis
  - Myasthenia Gravis
  - Guillain Barre syndrome
  - Multiple sclerosis
  - Parkinson's disease
- Cervical spinal injury
- Trauma
- Chemo and Radiotherapy
- Tracheostomy (+) artificial ventilation
- Medication
- Ageing



Normal swallowing

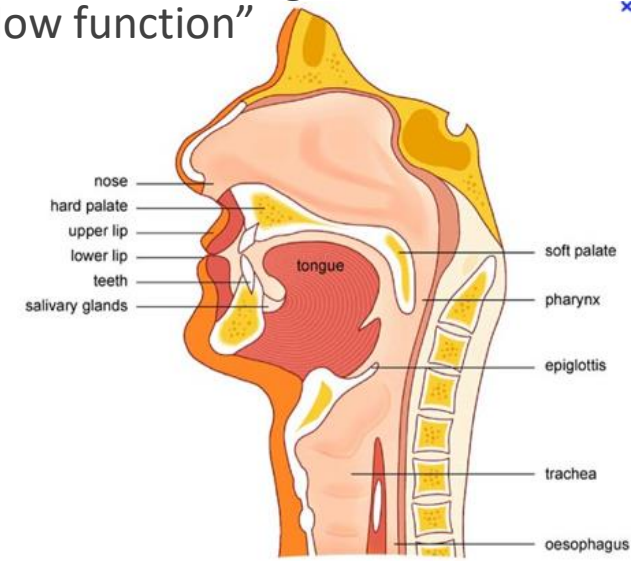
- Is the precise coordination between neural commands and anatomic structures to:
  - To sequence physiological and respiratory events
  - Which minimises the risk of aspiration and risk/choking
  - Integrates normal deglutition

Normal Swallowing – descriptive stages

1. Oral preparatory
2. Oral
3. Pharyngeal
4. Oesophageal

The swallow should be considered as one behaviour with four components acting together in an integrated manner to achieve successful swallow function"

Crary and Groher, 2003



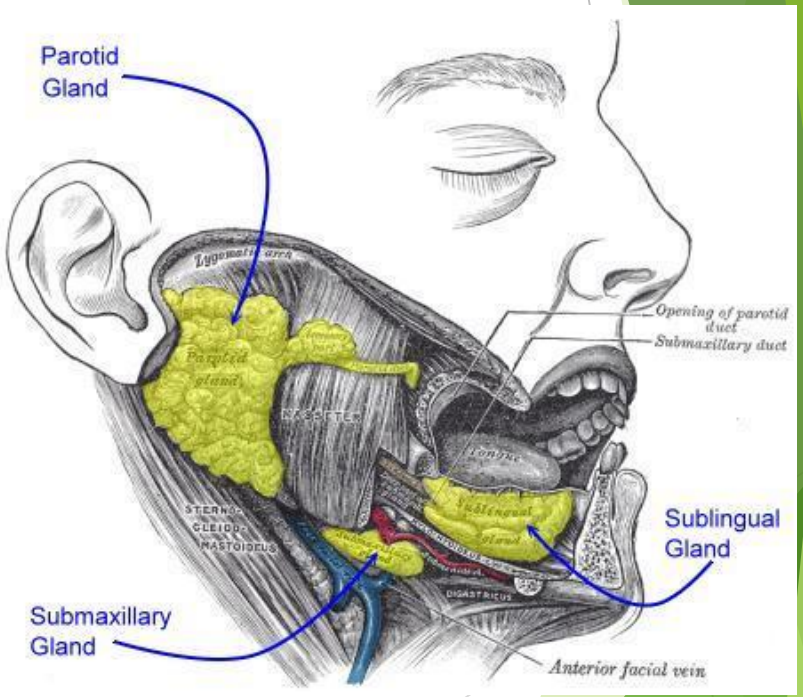
Swallowing Disorders

Normal Swallowing

- **Oral Preparatory Stage**
  - Biting and chewing food into a bolus
  - Needs coordination of lips, tongue and jaw movements
  - Tongue moves food onto chewing surface of teeth.
  - Chewing mixes food with saliva to form a bolus

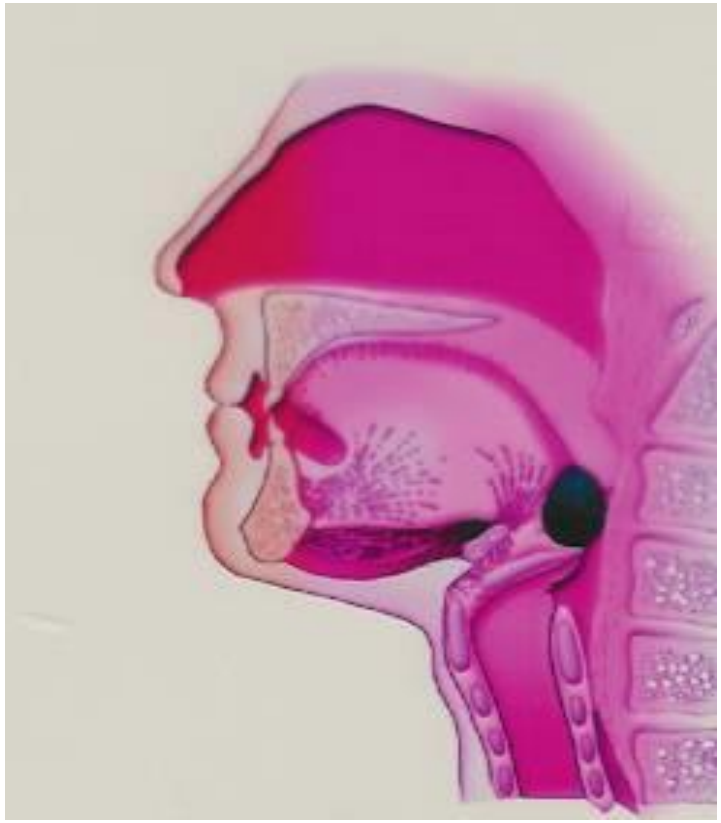
Salivary Glands

- You need saliva to swallow
- If unable to swallow, saliva drools from the mouth or inhale them, causing chest infections or aspiration pneumonia
- Meds to dry up saliva or replace it



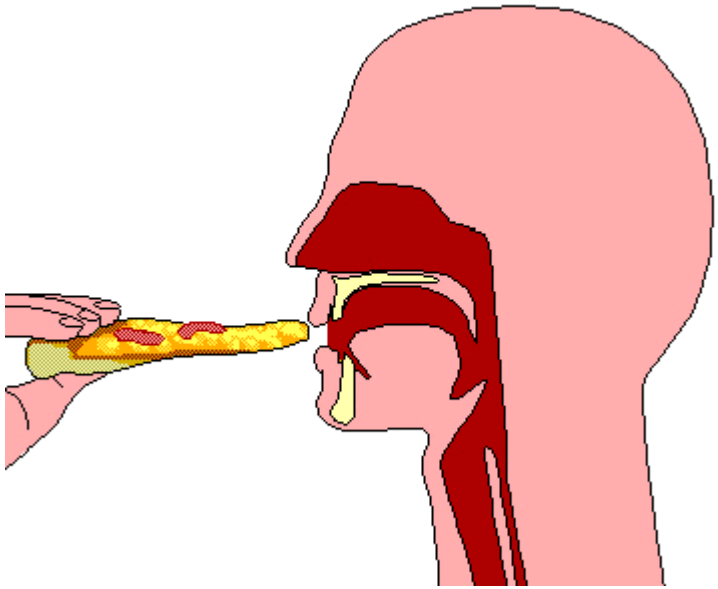
Swallowing Disorders

Normal Swallowing



- **Pharyngeal Stage**
- phase of swallowing is under involuntary neuromuscular control .
  - Larynx rises/breathing stops
  - Epiglottis folds down over airway
  - False and true vocal cords close
  - Food or fluid passes into oesophagus

Normal Swallow



Swallowing Disorders

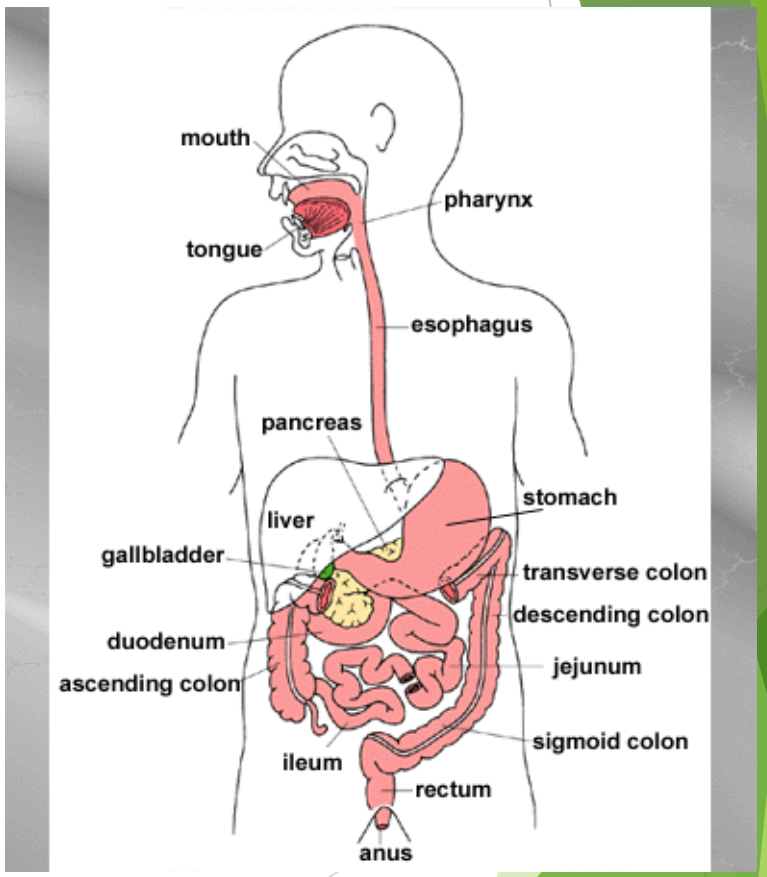
Normal Swallowing

- An awake adult swallows once per minute (1000 times daily) irrespective of eating.
- High rate is required because 1000 -1500ml of saliva is produced daily.
- Normal rate of secretion is 0.3-0.4ml per minute
- Rises to 2ml/min, during chewing

Swallowing Disorders

Oesophageal

- The oesophageal phase of swallowing is under involuntary neuromuscular control .
- The upper oesophageal sphincter relaxes to let food pass into the lumen of the tube to lower oesophageal sphincter and then into the stomach

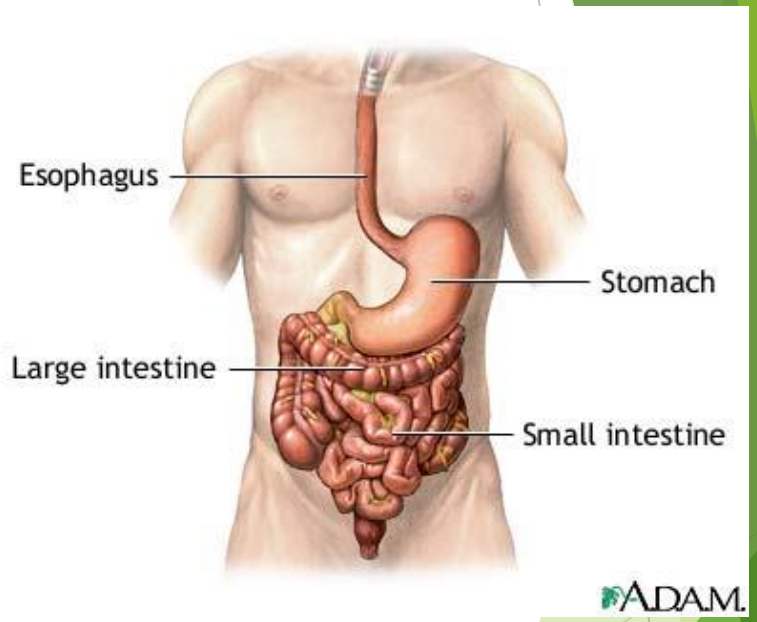


Principles of Deglutition -Jane Whitaker

Swallowing Disorders

Normal Swallowing

- **Oesophageal Stage**
  - From throat to stomach



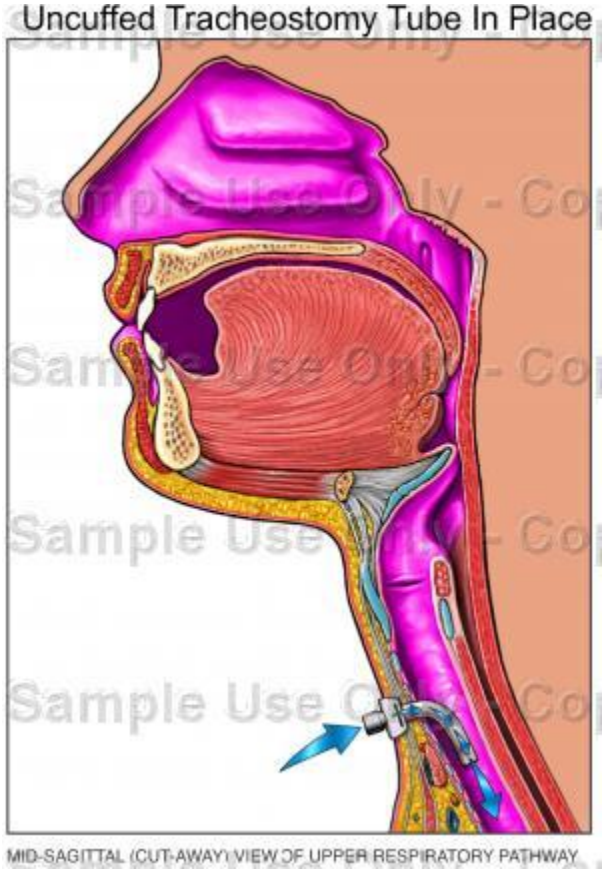
Swallowing Disorders
Main Causes of neurogenic dysphagia

- 50% all stroke patients will have OPD during acute phase of disease
- 95% PD patients will have OPD and oesophageal dysphagia
- 70% of severe acquired brain Injury will have OPD
- 80% of patients with dementia will have eating, drinking and swallowing problems.
- 45% cervical spinal injuries will OPD and require assistance at mealtimes

Deterioration in Swallowing Function (ageing)

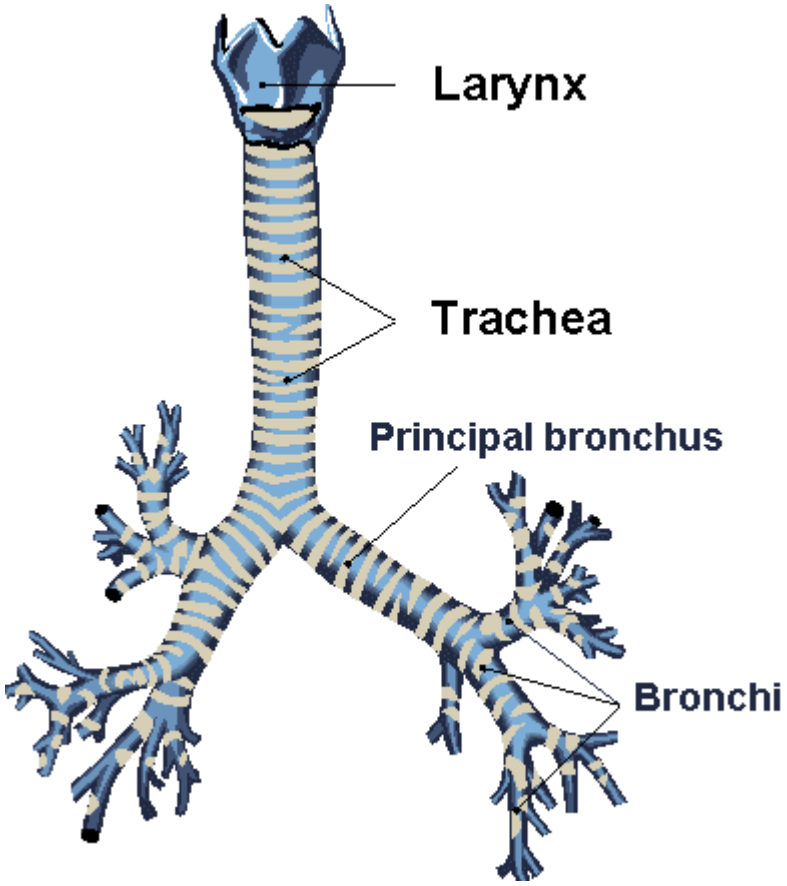
- Ageing 65+ has a considerable impact on altering the swallowing pattern
- Anatomical
- Physiological
- Modest changes occur slowly and insidiously but may significantly reduce functional reserve, capacity and endurance, increasing vulnerability to dysphagia and airway invasion secondary to disease

Swallowing in Patients with tracheostomy. Nasogastric tubes and orogastic tubes



- Placement of tracheostomy tube may affect some of the normal sequences of swallowing such as
  - Laryngeal elevation
  - Cricopharyngeus opening
  - Compress oesophagus
  - Disrupt airflow
  - -impair sensation and taste
  - Olfactory senses dulled
  - Recent research suggests main causes due to pre-morbid dysphagia and aging the more likely causes. ***Leder and Suiter 2013***

Male adult
=2.5 cm
Female adult
=2.0 cm



Overview of dysphagia assessment

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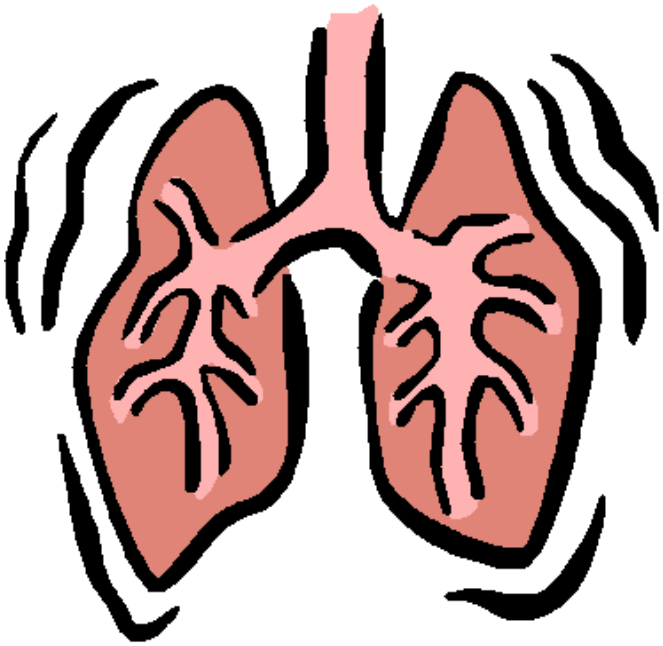
Four main elements involved in the swallowing

examination

1. Medical history including MUST Score
2. The Patient's description of symptoms
3. Cognitive abilities and awareness levels
4. Oro-motor examination
5. Oral trials as indicated

Swallowing Disorders
Why Important?



- Inadequate hydration and nutrition
- Unable to take medication
- Food and fluid enters lungs
- Chest infection
- Pneumonia
- Airway obstruction
- Increase likelihood of death
- Increase likelihood of secondary disease

Swallowing Disorders

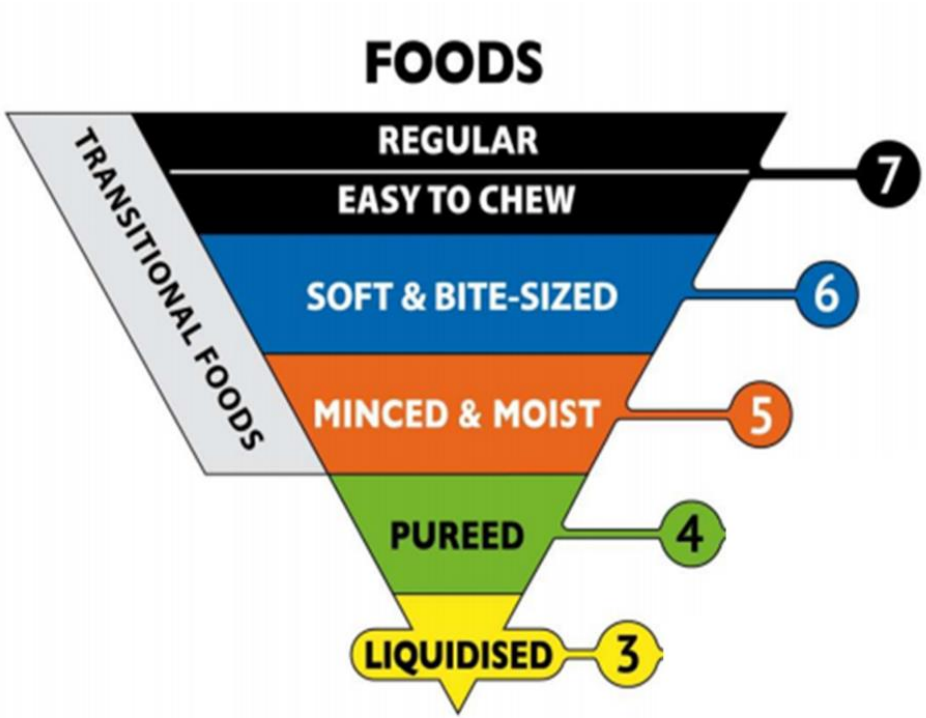
Prevention

Early identification

- Coughs while eating or drinking
- Leaves food
- Food left in mouth- squirreling
- Wet gurgly voice
- Choking
- Chest pain
- Chest infection

Swallowing Disorders

Management



- High risk patients need to be screened with functional swallow assessment as described
- Modified diet dysphagia diet
- IDDSI Levels
- A combination of both oral and enteral

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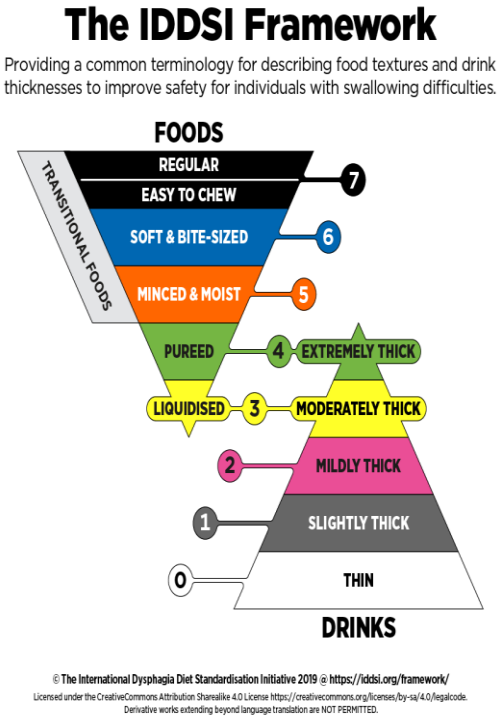
ABOUT THICKENED FLUIDS!

Fluids can be naturally thick or modified by making them into:

- Smoothies
  - Or thickening with a gum based powder we use Nutalis Clear
- Level 0 (thin) unthicken
- Level 1 Slightly thick
- Level 2 Mildly thick
- Level 3 Moderately thick
- Level 4 Extremely Thick

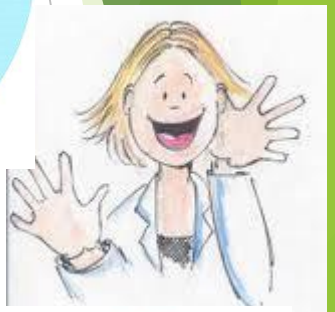


High Risk Food

- **High risk choking foods**
- **Avoid these textures if you are on a texture modified diet (IDDSI Level 3 – 6)**
- **Hard foods:** boiled sweets, nuts
- **Mixed thin/thick textures:** cereal with milk, soup with food pieces
- **Dry foods:** crackers, dry cake, bread
- **Crispy or crunchy food:** crisps, flaky pastry
- Pips, seeds, pith/inside skin, skins or shells: peas, grapes
- **Crumbly foods:** biscuits, pie crust
- **Tough foods:** steak, bacon
- Skin, bone, or gristle
- **Floppy foods:** lettuce, thinly sliced cucumber, spinach
- **Stringy foods:** beans, rhubarb
- **Sticky foods:** marshmallows, some cheeses
- Juicy foods where the juice separates off in the mouth

Getting it Right - Who's Responsibility?

- Who do you think should be responsible for ensuring the patients gets the diet that suits them and their swallowing needs?



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Preparation before eating and drinking

- **Getting ready to assist with eating and drinking. Please check:**
- **Knowing your patient**
  - Alertness levels/Anticipation
  - Mouth State
  - Environment
  - Positioning
  - Communication Strategies

Safe Oral Feeding

- Calm quiet environment
- Appropriate cutlery
- Small mouthfuls
- Watch for the swallow
- Ensure mouth clear before giving next mouthful
- Ask or gauge if the patient is ready for the next mouthful

All Patients who have swallowing difficulties have a Personal Place Mat (PPM)

Personal Place Mat (PPM)

Optional Add photograph

Name: **Date:**

PPM is a summary of important information about mealtimes
Helping to make mealtimes safe, successful and pleasurable.
Easily accessible, cleaned and portable - available when needed.
Can help people who cannot easily speak for themselves

IDDSI
International Dysphagia Diet Standardisation Initiative
www.iddsi.org

Food level	Drink level

If there are any concerns or changes to swallowing withdraw PPM immediately and refer to SLT.
Some of the clinical signs that can indicate a swallowing difficulty include coughing/choking on food or drink, wet gargly voice, recurrent chest infections, weight loss. It is the responsibility of direct support staff to review the PPM. Carla Bryson & Jane Whitaker, MRCSLT.

- All PPM's have a description of the dysphagia diet the patient is on.
- What equipment to use
- What the risks are from oral feeding

Personal Place Mat
Name: **Date:**
Name of person who completed mat:

Swallow This is placeholder text to replace with your own words. This section should state if you have ever had a swallowing assessment and date of your last report.

Food. This is placeholder text to replace with your own words. State if you are on a special diet or dysphagia diet, e.g. level 4,5 or 6. Describe how to prepare food. State any allergies. Estimate amount if important. Indicate particular likes and dislikes.

Drink. This is placeholder text to replace with your own words. State if on thickened drinks, e.g. level 1, 2 or 3. Describe how to give drinks, pace, amount and temperature if important. Describe likes and dislikes.

Routine, where and when This is placeholder text to replace with your own words. Describe important environmental factors including, noise level, position within the room, who you eat with. Describe important eating routines. Estimate frequency and timing of food and drink.

Position This is placeholder text to replace with your own words. Outline special seating or furniture, e.g. chair with arms, wheelchair, small table. Support needed to achieve and maintain an upright posture. It may be useful to include a photograph or refer to a postural passport.

Equipment and protection. This is placeholder text to replace with your own words. List all specialised equipment, e.g. scoop bowl, non-slip mat. It may be useful to insert a photograph. Detail how to protect your clothing from spillage.

Communication This is placeholder text to replace with your own words. Describe how you communicate, e.g. that you are hungry, thirsty, want more, had enough, in pain etc. Describe how you choose what you want to eat and drink, e.g. if you choose from a photographic menu.

Supervision This is placeholder text to replace with your own words. State if you require any support or supervision at mealtimes and what level of supervision.

Risks and help I need. Highlight any risks at mealtimes, e.g. choking, aspiration. Include any medical conditions that could impact on eating and drinking, e.g. epilepsy, diabetes. How you take medications safely. Any oral hygiene routine or how to support you to freshen up after eating.

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Some of the clinical signs that can indicate a swallowing difficulty include coughing/choking on food or drink, wet gargly voice, recurrent chest infections, weight loss. It is the responsibility of direct support staff to review the PPM.

Successful Spoon Placement Myths

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Mealtimes – When to stop!

Remember: Don't even start assisting your patient if they are drowsy!. Check medication and rehab regime is this making them drowsy at mealtimes

- If they start to **cough** and **choke**
- If there is an **airway obstruction**
- If the patient becomes **agitated/distressed**
- If the patient becomes very **fatigued** during meal
- If the patient **refuses** to eat or drink

REMEMBER TO DOCUMENT ALL INSTANCES OF COUGHING/CHOKING OR FOOD/FLUID REFUSAL IN CARE PLAN AND NOTIFY SENIOR NURSE

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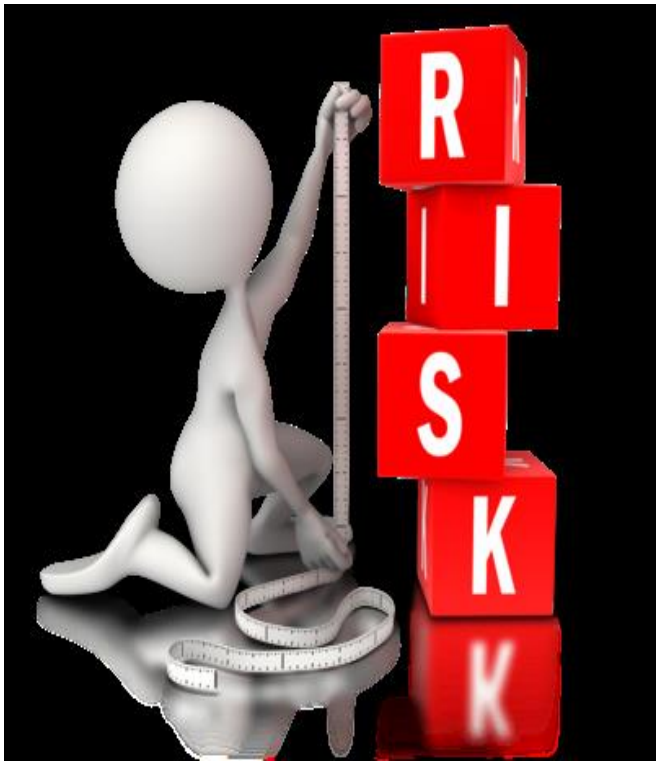
Finally !



- Risk management policy on choking prevention
  - Standardization in daily operational standards
  - All staff to understand risks associated with impaired swallowing
  - How to record and document risks