

Lymphadenopathy

Lymphadenopathy is defined by lymph nodes that are abnormal either in size, consistency or number. While the majority of patients presenting to the GP have benign lymphadenopathy, enlarged lymph nodes can be associated with malignancy or other serious causes. Hence, it is vital to develop a structured approach to assessment of lymphadenopathy to avoid under- or over-investigation. The focus of registrar teaching should be to identify red flags, differentiate between benign versus malignant presentations, and apply a rational approach to test ordering.

TEACHING AND LEARNING AREAS



- Pathophysiology and lymph nodes and lymphatic drainage patterns
- Causes of lymphadenopathy using <u>MIAMI mnemonic</u>: malignancies, infections, autoimmune disorders, miscellaneous, iatrogenic (including medications)
- Structured approach to history, including key features that distinguish a broad range of differentials
- Red flag features for possible malignancy
- <u>Systematic approach to examination</u> including localised vs generalised lymphadenopathy, presence of organomegaly
- Rational ordering of pathology and imaging (in children and adults)
- Appropriate referral and pathways
- Safety netting and follow up

PRE- SESSION ACTIVITIES

· Read the AJGP article: An approach to neck masses in adults

TEACHING TIPS AND TRAPS



- Lymphadenopathy should be classified as localised or generalised
- Tender lymphadenopathy is caused by stretching of the capsule during rapid growth, and can occur with malignancy, inflammation or infection
- Hodgkin's lymphoma commonly presents with localised neck lymphadenopathy
- The nature of the lymphadenopathy (hard, rubbery etc) is unreliable in predicting malignancy
- Supraclavicular lymphadenopathy is associated with high risk of intra-abdominal malignancy
- Axially lymphadenopathy has a wide differential apart from local causes, many cancers (breast, lung, thyroid, stomach, colorectal, pancreatic, ovarian, kidney) can metastasise to the axilla
- Lymphadenopathy can be secondary to medications including atenolol, penicillins, allopurinol, betablockers, anti-epileptics
- First-line investigations for neck lumps in adults at risk of malignancy are contrast CT of the neck and fine-needle aspiration (FNA)
- Ultrasound +/- CXR (if malignancy is suspected) are the preferred imaging modalities for persistent cervical lymphadenopathy in children
- In children with acute unilateral anterior cervical lymphadenitis and systemic symptoms, empiric antibiotics may be given

RESOURCES



- 2016 AAFP article Unexplained lymphadenopathy
- RCH Clinical Practice Guidelines: <u>Cervical Lymphadenopathy</u>

Listen

• Curbsiders podcast #202 Lymphadenopathy 2020 (43 minutes - start from 7:00)

FOLLOW UP & EXTENSION ACTIVITIES

Registrar to undertake clinical reasoning challenge and discuss with supervisor



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Clinical Reasoning Challenge

Terry Jenkins is a 45 year old man who presents with a five-week history of a rapidly enlarging cervical neck mass. He has been to your surgery three times in the last two years for pre-employment medicals and twice to request STI screening.

QUESTION 1.	What are the MOST IMPORTANT key features on further history taking as risk factors for malignancy? List as many as appropriate.
QUESTION 2.	Your examination reveals a 2cm firm non-tender lymph node in the internal jugular chain, suspicious for malignancy. What are the MOST IMPORTANT investigations to order at this point? Are there any other steps you would take at this presentation?



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ANSWERS

QUESTION 1

What are the MOST IMPORTANT key features on further history taking as risk factors for malignancy? List as many as appropriate.

- · Unexplained weight loss
- Night sweats
- Fever
- Other lymph nodes
- Smoking
- Other GI/ENT symptoms e.g. dysphagia, hoarse voice
- · Previous malignancy
- Previous radiation therapy

QUESTION 2

Your examination reveals a 2cm firm non-tender lymph node in the internal jugular chain, suspicious for malignancy. What are the MOST IMPORTANT investigations to order at this point?

Are there any other steps you would take at this presentation?

- · Contrast CT scan of the neck
- · Fine-needle aspiration biopsy