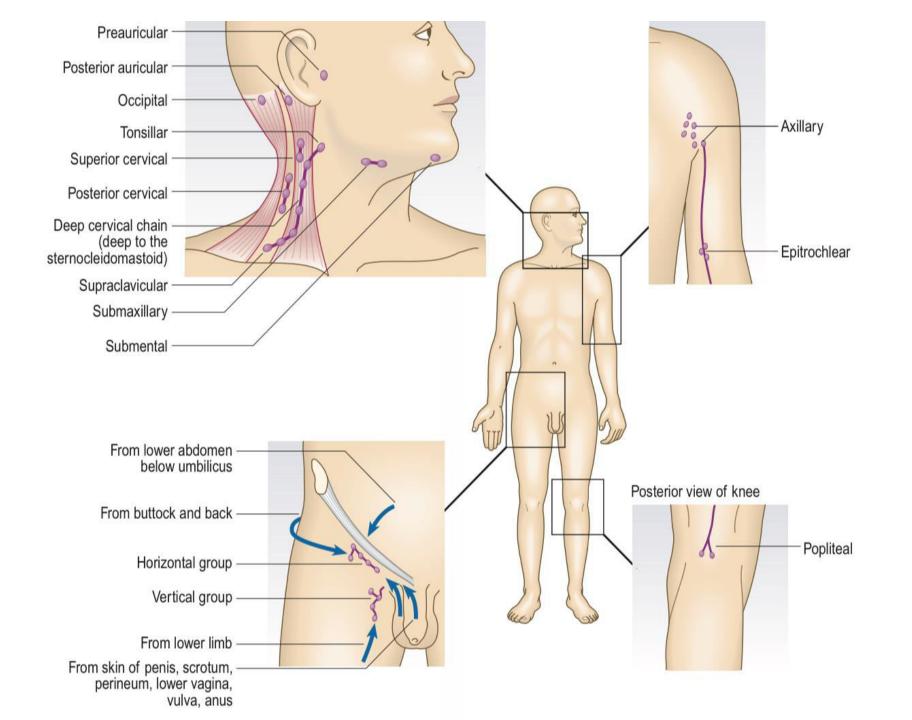
# THE LYMPH NODES

Lymph nodes may be palpable in normal people, especially in the submandibular, axilla and groin regions.

Distinguish between normal and pathological nodes.

Pathological lymphadenopathy may be local or generalised, and is of diagnostic and prognostic significance in the staging of lymphoproliferative and other malignancies.



• Size

Normal nodes in adults are <0.5 cm in diameter.

• Attachments

Lymph nodes fixed to deep structures or skin suggest malignancy.

• Consistency

Normal nodes feel soft. In Hodgkin's disease they are characteristically 'rubbery', in tuberculosis they may be 'matted', and in metastatic cancer they feel hard.

• Tenderness

Acute viral or bacterial infection, including infectious mononucleosis, dental sepsis and tonsillitis, causes tender, variably enlarged lymph nodes.

• Examination sequence

General principles

Inspect for visible lymphadenopathy.

Palpate one side at a time using the fingers of each hand in turn.

- Compare with the nodes on the contralateral side.
- Assess: site, size.

Determine whether the node is fixed to surrounding and deep structures skin.

Check consistency.

Check for tenderness.

# 3.12 Important common causes of lymphadenopathy

### Generalised

- Viral: Epstein–Barr virus (glandular fever or Burkitt's lymphoma), cytomegalovirus, human immunodeficiency virus
- Bacterial: brucellosis, syphilis
- Protozoal: toxoplasmosis
- Malignancy: lymphoma, acute or chronic lymphocytic leukaemia
- Inflammatory: rheumatoid arthritis, systemic lupus erythematosus, sarcoidosis

### Localised

- Infective: acute or chronic, bacterial or viral
- Malignancy: lymphoma

# AND SKIN LESIONS



## 4.2 Causes of severe pruritus

Condition	Look for:
Scabies	Burrows on hands or feet
Dermatitis herpetiformis	Small blisters on extensor sites
Urticaria	Intermittent wheals on limbs or trunk
Eczema	Scaly, crusted, excoriated or lichenified patches
Insect bites	Linear or grouped patterns of recent onset
Lichen planus	Typical purplish papules on wrists
Generalised itch	If no rash, check blood tests for renal, haematological or hepatic diseases







4.4 Terms used to describe skin lesions	
Term	Definition
Abscess	A localised collection of pus
Atrophy	Loss of epidermis, dermis or both, thin, translucent and wrinkled skin, visible blood vessels
Bulla	A fluid-filled blister >5 mm in diameter
Burrow	A tunnel in epidermis caused by a parasite, e.g. <i>Acarus</i> in scabies
Callus	Local hyperplasia of horny layer on palm or sole, due to pressure
Comedo	A plug of sebum and keratin wedged in a dilated pilosebaceous orifice on the face
Crust	Dried exudate, e.g. serum, blood or pus, on the skin surface
Cyst	A nodule consisting of an epithelial-lined cavity filled with fluid or semisolid material
Ecchymosis	A macular red or purple haemorrhage, >2 mm in diameter, in skin or mucous membrane
Erosion	A superficial break in the epidermis, not extending into dermis, heals without scarring
Erythema	Redness of the skin due to vascular dilatation
Excoriation	A superficial abrasion, often linear, due to scratching
Fissure	A linear split in epidermis, often just extending into dermis
Freckle	A macular area showing increased pigment formation by melanocytes
Lichenification	Chronic thickening of skin with increased skin markings, from rubbing or scratching
Macule	A localised area of colour or textural change in the skin

Term	Definition
Milium	A small white cyst that contains keratin
Nodule	A solid elevation of skin >5 mm in diameter
Papilloma	A nipple-like projection from the surface of the skin
Papule	A solid elevation of skin <5 mm in diameter
Petechia	A haemorrhagic punctate spot 1–2 mm in diameter
Plaque	A palpable elevation of skin >2 cm diameter and <5 mm in height
Purpura	Extravasation of blood resulting in redness of skin or mucous membranes
Pustule	A visible collection of pus in a blister
Scale	Accumulation of easily detached fragments of thickened keratin
Scar	Replacement of normal tissue by fibrous connective tissue at the site of an injury
Stria	Atrophic linear band in skin, white, pink or purple, from connective tissue changes
Telangiectasia	Dilated dermal blood vessels resulting in a visible lesion
Ulcer	A circumscribed area of skin loss extending into the dermis
Vesicle	A clear, fluid-filled blister <5 mm in diameter
Wheal	A transitory, compressible papule or plaque of dermal oedema, red or white, indicating urticaria

- Hair loss (alopecia) can be total or partial.
- Diffuse alopecia. In common male-pattern. This aging phenomenon is strongly inherited and depends on androgens.
- Age-related hair loss in women is more diffuse. Non-scarring diffuse hair loss occurs in hypothyroidism, hypopituitarism and iron deficiency, connective tissue diseases, e.g. SLE, postpartum or postmenopausal or may be drug-induced, e.g. cytotoxic agents.

- Localised non-scarring alopecia. In alopecia areata there is circumscribed loss of scalp, beard or eyebrow hair.
- Alopecia areata may involve the whole scalp (alopecia totalis) or all body hair. (alopecia universalis). Localised hair loss can be caused by fungal infection, hair pulling, traction from braiding and secondary syphilis.

# Causes of hirsutism

- Pituitary Acromegaly
- Adrenal Cushing's syndrome, virilising tumours, congenital adrenal hyperplasia
- Ovarian Polycystic ovary syndrome, virilising tumours
- Drugs Androgens, progestogens
- Idiopathic End-organ hypersensitivity to androgens

# Common endocrine symptomes

Weight gain

- Hypothyroidism, polycystic ovary
- syndrome (PCOS), Cushing's
- syndrome

Weight loss

- Hyperthyroidism, diabetes
- mellitus, adrenal insufficiency

Short stature

#### Constitutional, non-endocrine

- systemic disease (e.g. coeliac
- disease), growth hormone
- deficiency

#### **Delayed puberty**

- Constitutional, non-endocrine
- systemic disease,
- hypothyroidism, hypopituitarism,
- primary gonadal failure

#### Menstrual disturbance

- PCOS,
- hyperprolactinaemia,
- thyroid dysfunction
- Diffuse neck swelling
- Simple goitre,
- Graves' disease,
- Hashimoto's thyroiditis

### **Excessive thirst**

- Diabetes mellitus or insipidus,
- hyperparathyroidism, Conn's
- syndrome

## Hirsutism

- Idiopathic, PCOS, Cushing's
- syndrome,
- congenital adrenal hyperplasia

#### Sweating

- Hyperthyroidism,
- hypogonadism,
- acromegaly, phaeochromocytoma

#### Flushing

- Hypogonadism (especially menopause),
- carcinoid syndrome

#### **Resistant hypertension**

- Conn's syndrome,
- Cushing's syndrome,
- phaeochromocytoma,
- acromegaly,
- renal artery stenosis

Muscle weakness

- Cushing's syndrome,
- hyperthyroidism,
- hyperparathyroidism,
- osteomalacia
- Bone fragility and fractures
- Hypogonadism,
- hyperthyroidism,
- Cushing's syndrome