ONE-PAGE CHEAT SHEET

Thyroid and parathyroid

Nodules, cancer, calcium and complications

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Free surgical teaching

THYROID NODULE

- **TSH first**: low TSH → isotope scan (a hot nodule is rarely malignant)
- Normal TSH: **ultrasound** grading, then FNA if indicated
- Bethesda: I non-diagnostic, II benign, III atypia, IV follicular neoplasm, V suspicious, VI malignant

THYROID CANCERS

- **Papillary** (about 80%): lymphatic spread, excellent prognosis
- **Follicular**: blood spread to bone and lung; needs histology to diagnose
- **Medullary**: C cells, calcitonin; MEN2 (RET gene)
- **Anaplastic**: elderly, rapid, poor prognosis; lymphoma with Hashimoto's

AFTER THYROIDECTOMY

- **Neck haematoma** with stridor: open the wound at the bedside (skin, sutures, muscles), then call for help
- Recurrent laryngeal nerve: hoarseness; bilateral palsy → stridor
- External branch of superior laryngeal nerve: voice fatigue, loss of high pitch
- **Hypocalcaemia**: tingling, Chvostek's, Trousseau's: check calcium and PTH

PRIMARY HYPERPARATHYROIDISM

- High calcium with high or inappropriately normal PTH
- Single adenoma in about 85%
- Bones, stones, abdominal groans, psychic moans
- Exclude familial hypocalciuric hypercalcaemia: urine calcium/creatinine clearance ratio

PARATHYROID SURGERY

- Indications: symptoms; or calcium over 0.25 mmol/L above normal, osteoporosis or fracture, eGFR under 60, stones, age under 50
- Localise with sestamibi and ultrasound (or 4D-CT), then focused parathyroidectomy
- **Hypercalcaemic crisis**: IV 0.9% saline, then bisphosphonate; treat the cause

EXAM PEARLS

- Graves': TSH-receptor antibodies, eye disease, pretibial myxoedema
- Correct calcium for albumin before interpreting it
- Thyroid storm after surgery in an unprepared hyperthyroid patient

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