PRACTICE POINT

PATIENTS AT INCREASED RISK FOR THYROID DISEASE

- Women over 45*
- Postpartum women
- Patients receiving drug therapies such as lithium and amiodarone (category 5)
- Patients with other autoimmune diseases such as Type I diabetes
- Patients with a strong family history of thyroid disease

** Note: There is evidence to suggest increased risk for thyroid disease in patients over the age of 60*

TSH is the single best initial test for the diagnosis of primary hyperthyroidism and hypothyroidism

- When patients are asymptomatic, seemingly healthy, having a periodic examination, NO testing is required
- When patients have suspected primary thyroid disease follow Algorithm - see page 3
- When patients are taking thyroid hormone replacement and dosage needs monitoring follow Category 2
- When patients are receiving thyroxine therapy for thyroid cancer follow Category 3
- When patients are pregnant and receiving thyroid hormone replacement follow Category 4
- When patients are receiving lithium or amiodarone follow Category 5a or 5b - see over

PRACTICE POINT

SYMPTOMS OF HYPOTHYROIDISM

- Weight gain
- Lethargy
- Cold intolerance
- Menstrual irregularities
- Depression
- Constipation
- Dry skin

SYMPTOMS OF HYPERTHYROIDISM

- Palpitations/Tachycardia/Atrial fibrillation
- Widened pulse pressure
- Nervousness and tremor
- Heat intolerance
- Weight loss
- Muscular weakness
- Usually goiter is present

CATEGORY 2: TSH USE IN THYROXINE THERAPY FOR TREATMENT OF HYPOTHYRODISM

- Thyroid replacement should be with L-Thyroxine. Do not use T3, T3/T4 combinations, or desiccated thyroid
- Target TSH in euthyroid range*
- TSH equilibration requires 8 to 12 weeks after any thyroxine dosage change
- Once a stable dose is achieved, yearly TSH is sufficient

** Patients on thyroxine therapy with TSH <0.5 mU/L may have increased health risk*

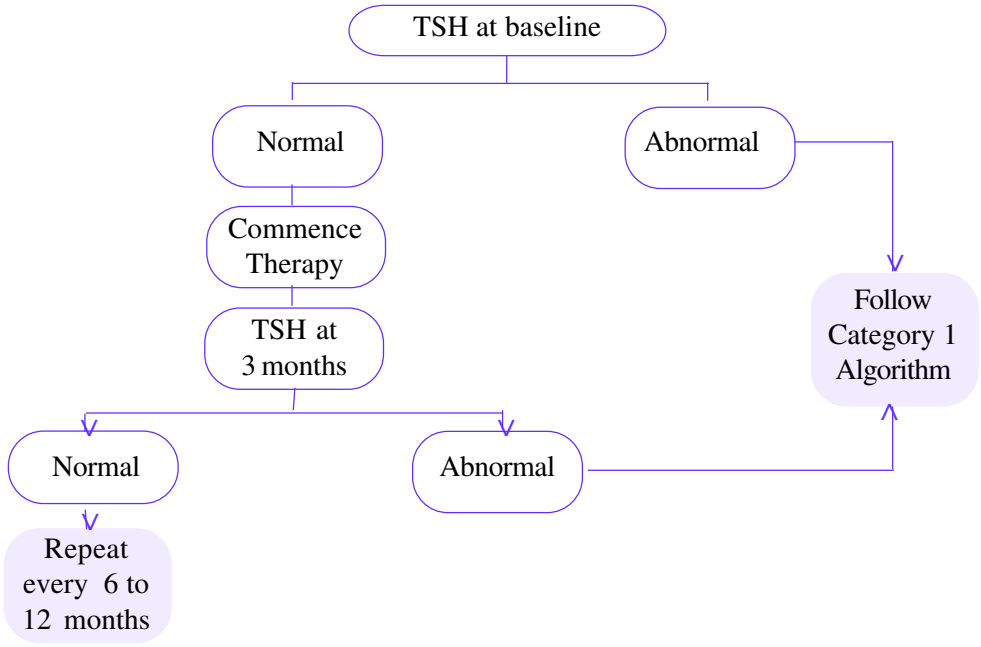
CATEGORY 3: TSH USE IN MONITORING THYROXINE THERAPY IN THYROID CANCER

- Target: Achieve suppressed TSH (<0.1 mU/L) to prevent re-growth of cancer

CATEGORY 4: PREGNANCY

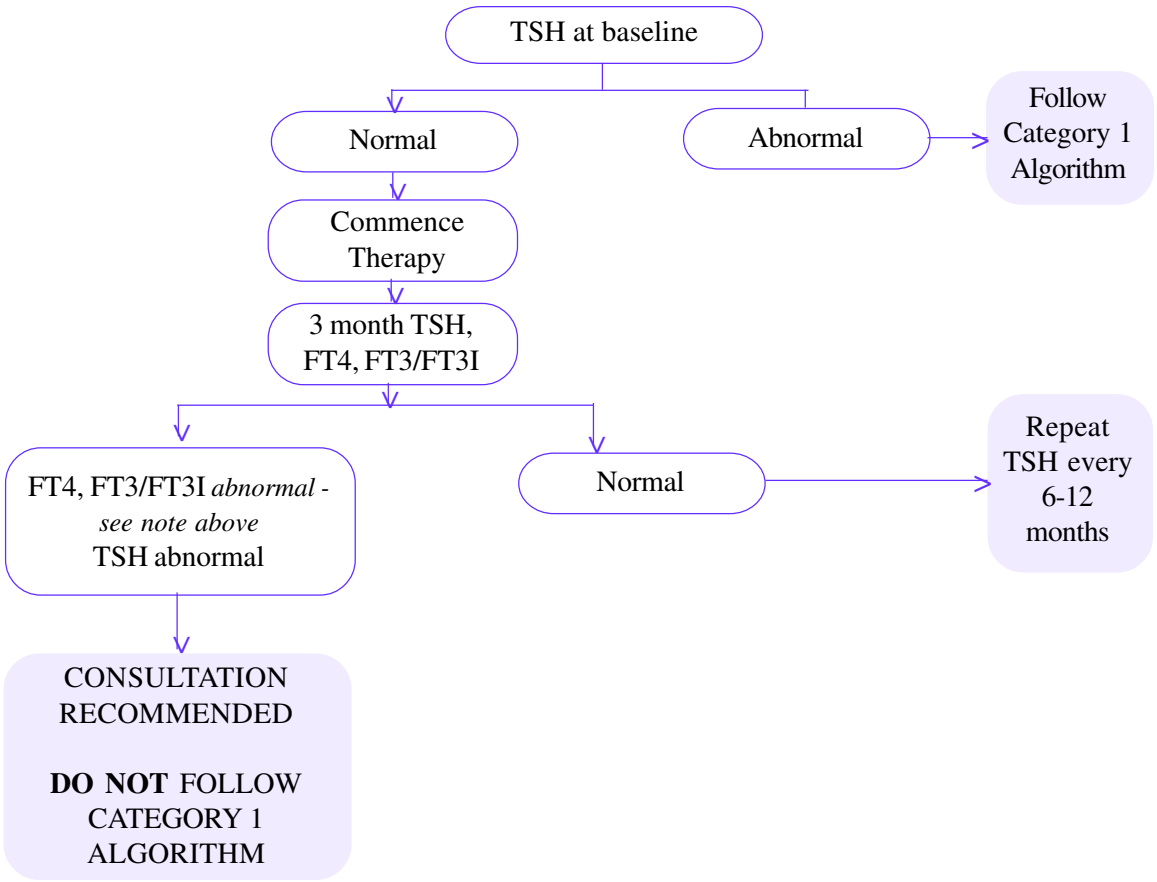
- In patients receiving thyroxine replacement:
  - TSH when pregnancy is confirmed and repeat every 2 months because of the increased demand for thyroxine during pregnancy
  - Thyroxine dose can be adjusted as required every 8 weeks based on TSH levels
  - TSH 0.5 – 5.0 mU/L is acceptable in pregnancy (Category 2)
- For patients with a history of Grave's disease, a TSH receptor antibody (TRAB) level is recommended. Consult endocrinology if TRAB ≥ 5 x normal.

CATEGORY 5A: PATIENTS RECEIVING LITHIUM



CATEGORY 5B: PATIENTS RECEIVING AMIODARONE

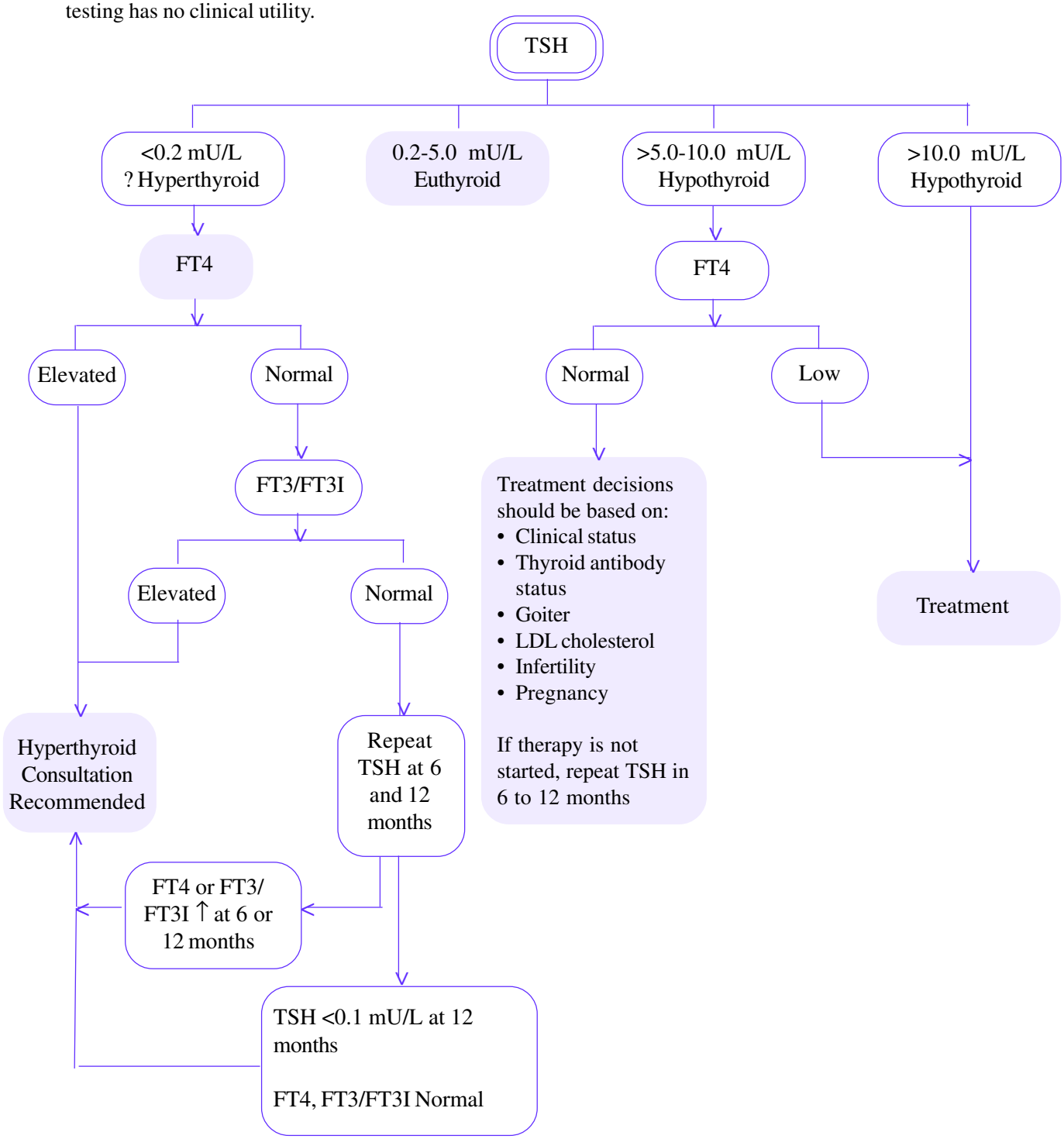
- Amiodarone may cause elevated FT4 in the presence of normal TSH (drug effect)
- Therefore, pretreatment TSH and 3 month post treatment TSH, FT4, and FT3/FT3I are recommended



ALGORITHM: SUSPECTED HYPER or HYPOTHYROIDISM*

** For patients receiving thyroid hormone therapy follow Category 2*

- Patients with thyrotoxicosis usually have a TSH value < 0.1 mU/L
- Thyroid antibodies are indicated in cases of hypothyroidism (TSH >5 mU/L) due to suspected autoimmune thyroid disease. Serum antibody (anti-TPO) testing should only be performed once for the diagnosis. Serial testing has no clinical utility.



For complete guideline refer to the TOP website: www.topalbertadoctors.org

Toward Optimized Practice

Alberta Clinical Practice Guidelines

Administered by the Alberta Medical Association