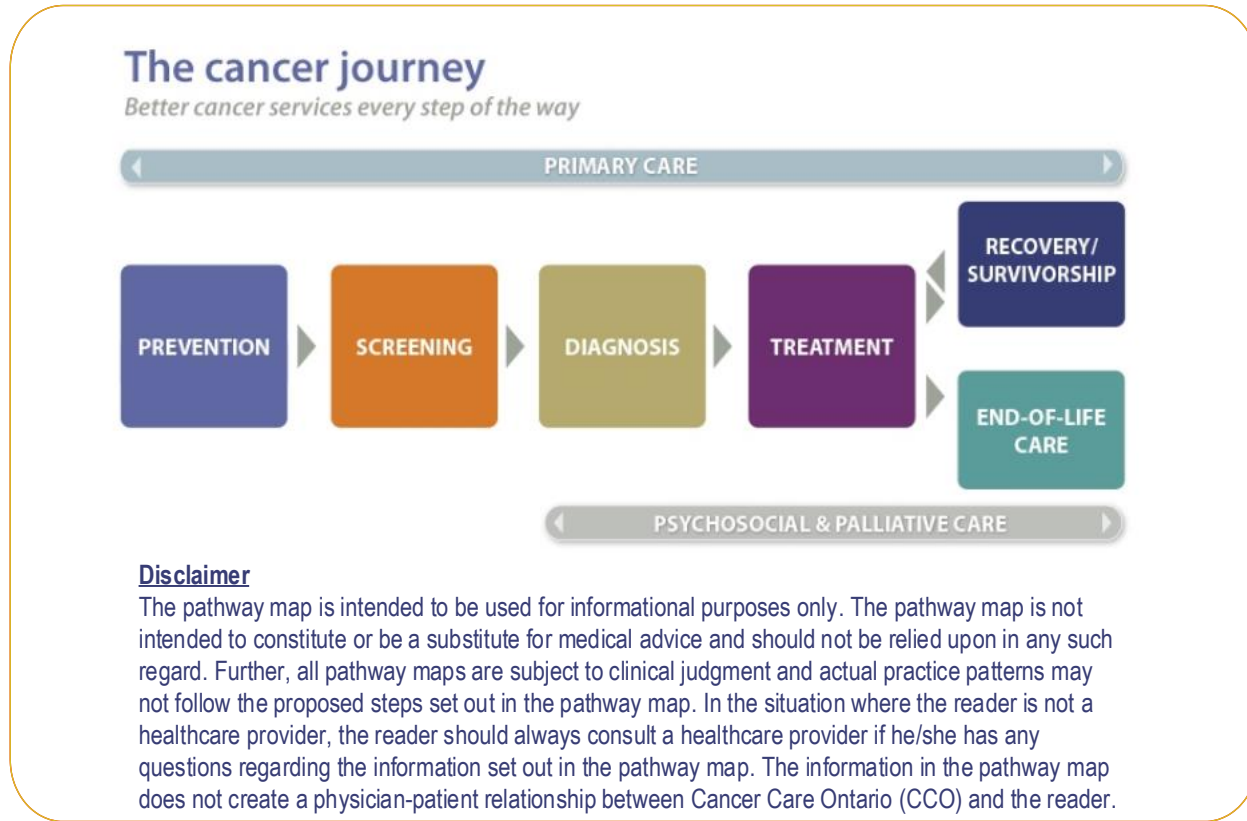


# Differentiated Thyroid Cancer Treatment Pathway Map

Version 2019.09



### Pathway Map Considerations

- Primary care providers play an important role in the cancer journey and should be informed of relevant tests and consultations. Ongoing care with a primary care provider is assumed to be part of the pathway map. For patients who do not have a primary care provider, [Health Care Connect](#), is a government resource that helps patients find a doctor or nurse practitioner.
- Throughout the pathway map, a shared decision-making model should be implemented to enable and encourage patients to play an active role in the management of their care. For more information see [Person-Centered Care Guideline](#).
- Hyperlinks are used throughout the pathway map to provide information about relevant CCO tools, resources and guidance documents, including documents from CCO's Evidence-Based Series (EBS).
- The term 'health care provider', used throughout the pathway map, includes primary care providers and specialists, nurse practitioners, endocrinologists, and emergency physicians.
- In Ontario, various specialties have taken on an expanded role in the management of differentiated thyroid cancers. Throughout the pathway, specialist referrals imply a physician with specific expertise in that particular aspect of the management of thyroid cancer
- Multidisciplinary Cancer Conferences provide a forum for discussing patients with thyroid cancer about whom there are complexities regarding diagnosis and management. For more information on Multidisciplinary Cancer Conferences visit [MCC Tools](#)
- For more information on wait time prioritization, visit: [Surgery Wait Time Prioritization](#)
- Clinical trials should be considered for all phases of the pathway map.
- Psychosocial oncology (PSO) is the interprofessional specialty concerned with understanding and treating the social, practical, psychological, emotional, spiritual and functional needs and quality-of-life impact that cancer has on patients and their families. Psychosocial care should be considered an integral and standardized part of cancer care for patients and their families at all stages of the illness trajectory. For more information, visit [EBS #19-3\\*](#)
- The following should be considered when weighing the treatment options described in this pathway map for patients with potentially life-limiting illness:
  - Palliative care may be of benefit at any stage of the cancer journey, and may enhance other types of care – including restorative or rehabilitative care – or may become the total focus care
  - Ongoing discussions regarding goals of care is central to palliative care, and is an important part of the decision-making process. Goals of care discussions include the type, extent and goal of a treatment or care plan, where care will be provided, which health care providers will provide the care, and the patient's overall approach to care
- For more information on the systemic treatment QPB please refer to the [Quality-Based Procedures Clinical Handbook for Systemic Treatment](#)





\* **Note.** [EBS#19-3](#) is older than 3 years and is currently listed as 'For Education and Information Purposes'. This means that the recommendations will no longer be maintained but may still be useful for academic or other information purposes.

### Pathway Map Notes










- Conversion factor for Tg ng/mL to pmol/L: 1 ng/mL Tg = ~1.515 pmol/L
- When measuring Thyroglobulin (Tg), include measurement of Thyroglobulin antibodies as well
- Adverse histopathological features: angioinvasion (excluding lymphatic invasion), tall cell (>30%), hobnail cell (>30%), columnar cell change in >30% of tumor, solid growth (>30%), widely invasive growth, any level of dedifferentiation, intrathyroidal psammomatous [Consensus]

### Pathway Map Legend



#### Colour Guide

	Primary Care
	Palliative Care
	Pathology
	Surgery
	Radiation Oncology
	Medical Oncology
	Radiology
	Multidisciplinary Cancer Conference (MCC)
	Endocrinology
	Nuclear Medicine
	Psychosocial Oncology

#### Shape Guide

	Intervention
	Decision or assessment point
	Patient (disease) characteristics
	Consultation with specialist
	Exit pathway
	Off-page reference
	Patient/Provider Interaction
	Referral
	Wait time indicator time point

#### Line Guide

	Required
	Possible

### Pathway Map Disclaimer

This pathway map is a resource that provides an overview of the treatment that an individual in the Ontario cancer system may receive.

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### Staging of Papillary and Follicular Thyroid Carcinoma

Age <55 years old			
Stage I	Any T	Any N	M0
Stage II	Any T	Any N	M1

Age ≥55 years old			
Stage I	T1a, T1b, T2	N0	M0
Stage II	T3	N0	M0
	T1-3	N1	M0
Stage III	T4a	Any N	M0
Stage IVA	T4b	Any N	M0
Stage IVB	Any T	Any N	M1

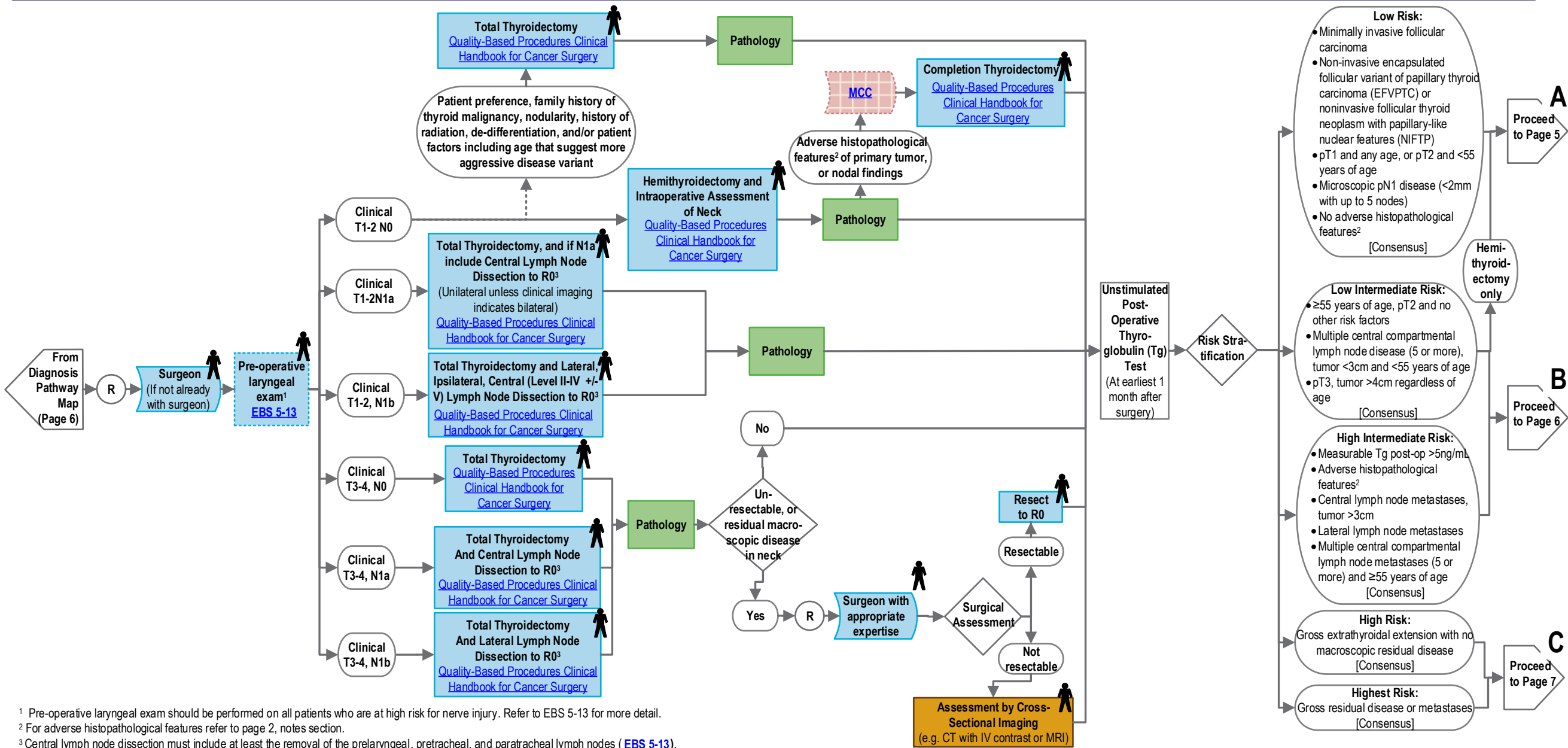
AJCC Cancer Staging Manual 8<sup>th</sup> edition

UICC The TNM Classification of Malignant Tumours, 8<sup>th</sup> Edition

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Screen for psychosocial needs, and assessment and management of symptoms. [Click here for more information about symptom assessment and management tools](#)

Consider the introduction of palliative care, early and across the cancer journey [Click here for more information about palliative care](#)

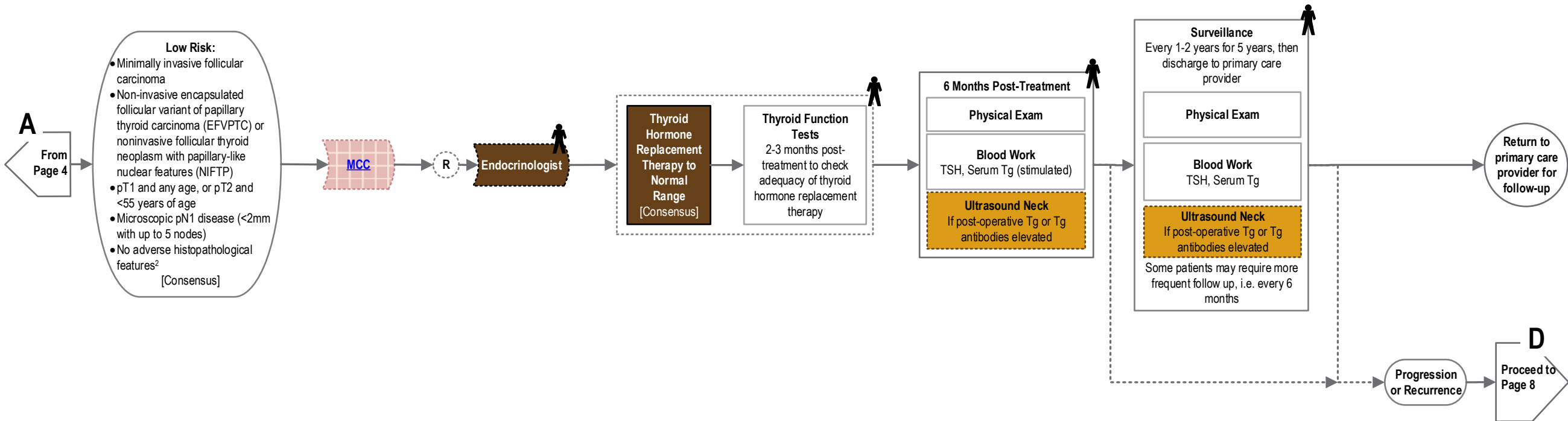


<sup>1</sup> Pre-operative laryngeal exam should be performed on all patients who are at high risk for nerve injury. Refer to EBS 5-13 for more detail.  
<sup>2</sup> For adverse histopathological features refer to page 2, notes section.  
<sup>3</sup> Central lymph node dissection must include at least the removal of the prelaryngeal, pretracheal, and paratracheal lymph nodes (EBS 5-13).

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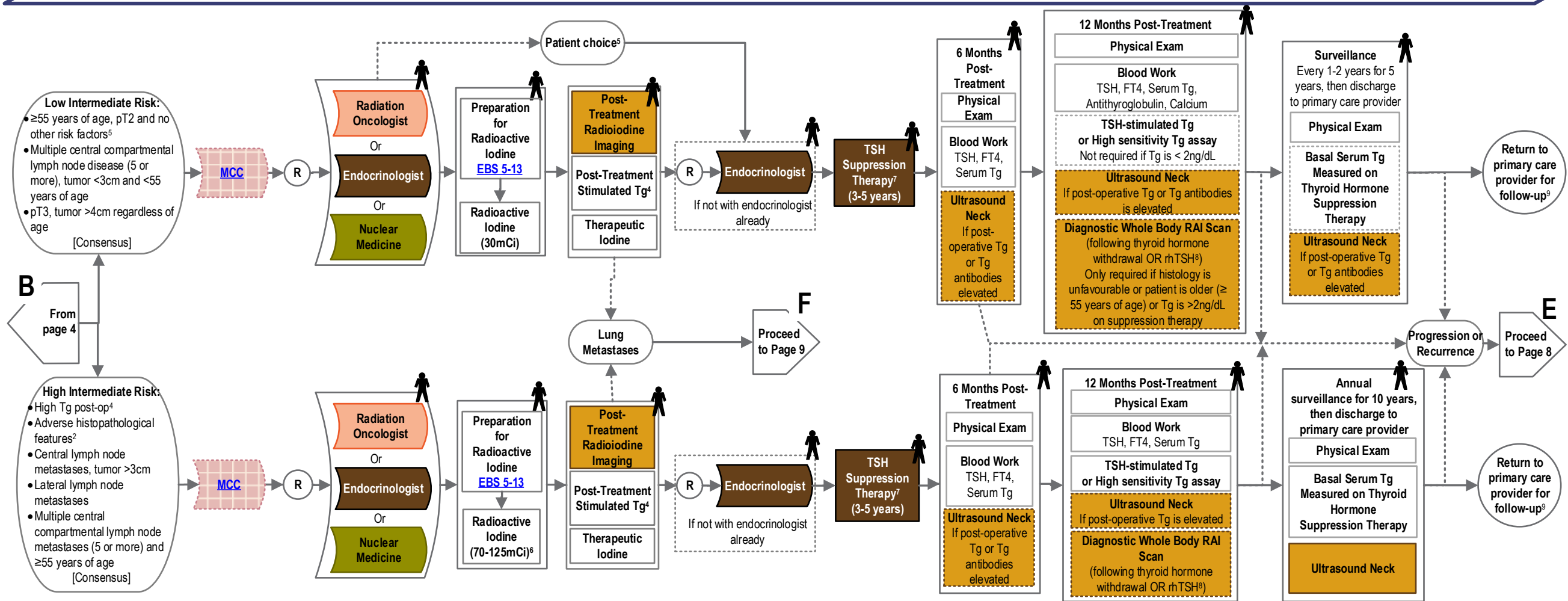


<sup>2</sup> For adverse histopathological features refer to page 2, notes section.

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<sup>2</sup> For adverse histopathological features refer to page 2, notes section.

<sup>4</sup> Tg level is assay dependent. Classifications may vary by center. [Consensus].

<sup>5</sup> Upon careful discussion patient may opt to not receive radioactive iodine, or patient who had hemithyroidectomy only and will therefore not have RAI.

<sup>6</sup> Appropriate radioactive iodine dosage should be proportional to risk. The high intermediate risk group is heterogenous, which warrants a broad range of appropriate dosages. 30 mCi may be appropriate for limited adverse histological features.

<sup>7</sup> Both the level and duration of TSH suppression is dependent on assessment of potential benefit, patient factors and risks. Initial TSH suppression should be within 0.1-0.5mIU/L for intermediate risk, <0.1mIU/L may be considered for higher risk [Consensus].

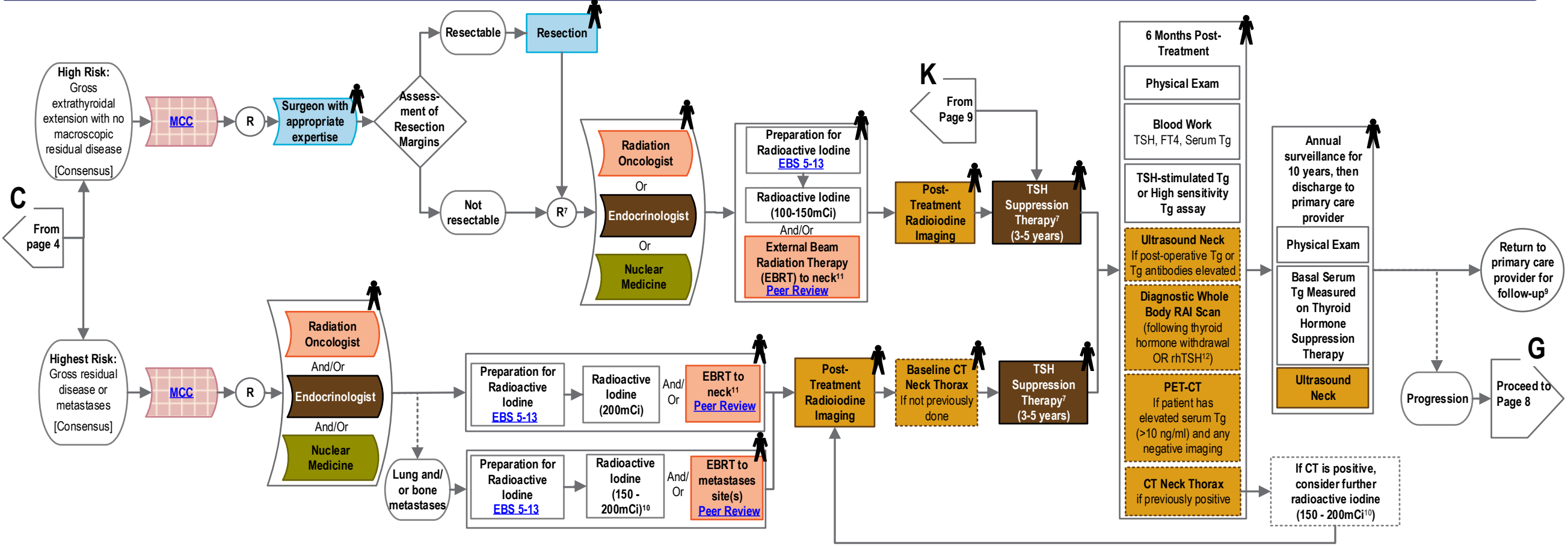
<sup>8</sup> Recombinant TSH is provincially not funded but can be accessed in place of thyroid hormone withdrawal if patient is insured, over the age of 65, or pays out of pocket. Recombinant TSH should be utilized if possible [Consensus].

<sup>9</sup> Recommend: Annual or biennial neck exam, TSH, thyroglobulin, antithyroglobulin, and calcium as indicated. If there is a new lump(s) or swelling in the neck area, persistent neck pain, change in voice or swallowing or rising thyroglobulin, US of neck and referral back to specialist are to be considered.

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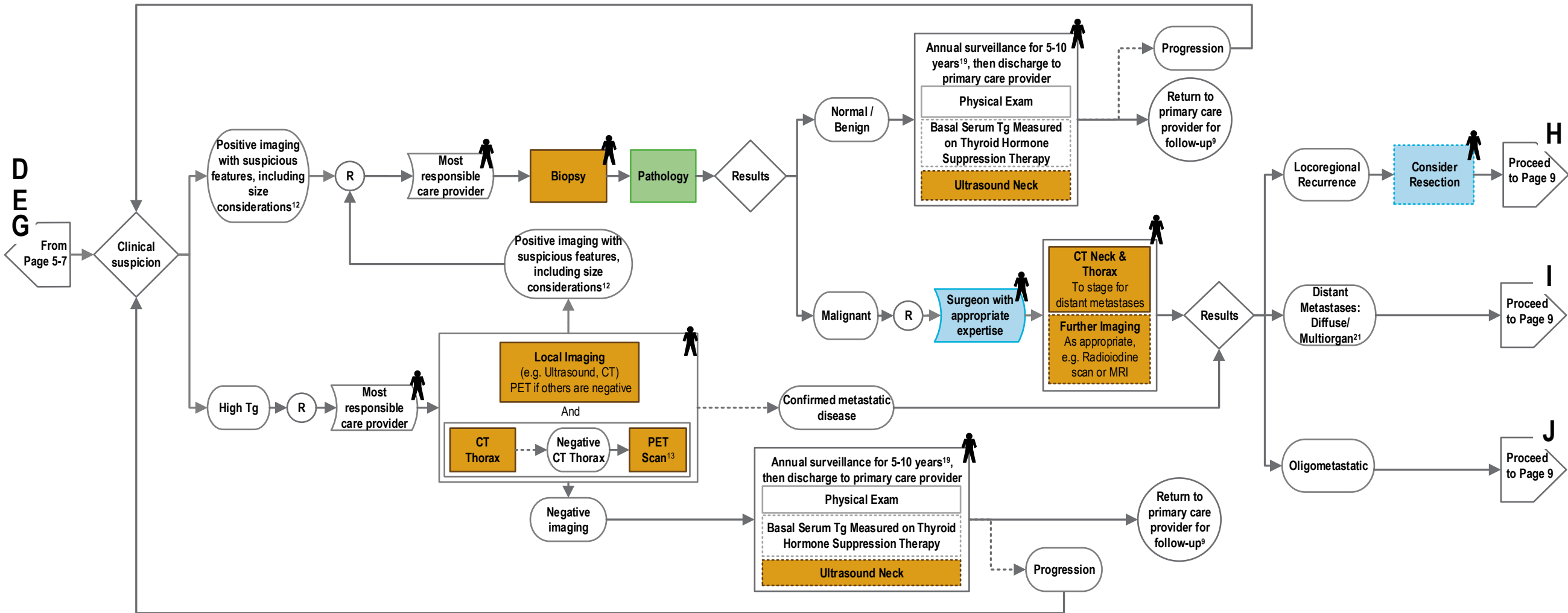
<sup>10</sup> In presence of lung metastases, consider age, number of lesions, and risk for fibrosis when determining RAI dosage. Avoid >150mCi for over patients over 70 (EBS 5-13); a dosage of 150mCi should be considered for older patients and those with higher risk of fibrosis, and a dosage of 200mCi should be considered for young, healthy patients with a greater number of lesions. Qualify with a glomerular filtration rate (GFR) Test [Consensus].

<sup>11</sup> Patient receiving EBRT should be referred to a Registered Dietitian and Speech Language Pathologist.

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<sup>9</sup> Recommend: Annual or biennial neck exam, TSH, thyroglobulin, antithyroglobulin, and calcium. If there is a new lump(s) or swelling in the neck area, persistent neck pain, change in voice or swallowing or rising thyroglobulin, US of neck and referral back to specialist are to be considered.

<sup>12</sup> Suspicious features that warrant nodal biopsy:

- On ultrasound: rounded shape, hypoechoic, cystic, small foci of calcification, or central necrosis
- On CT: rounded shape, enhancement, cystic, small foci of calcification, or central necrosis

- Size: size is **only** of consideration if there are suspicious features present, there is no need to biopsy on size alone. In presence of suspicious features, biopsy is recommended if the shortest dimension in the axial plane is >8mm.

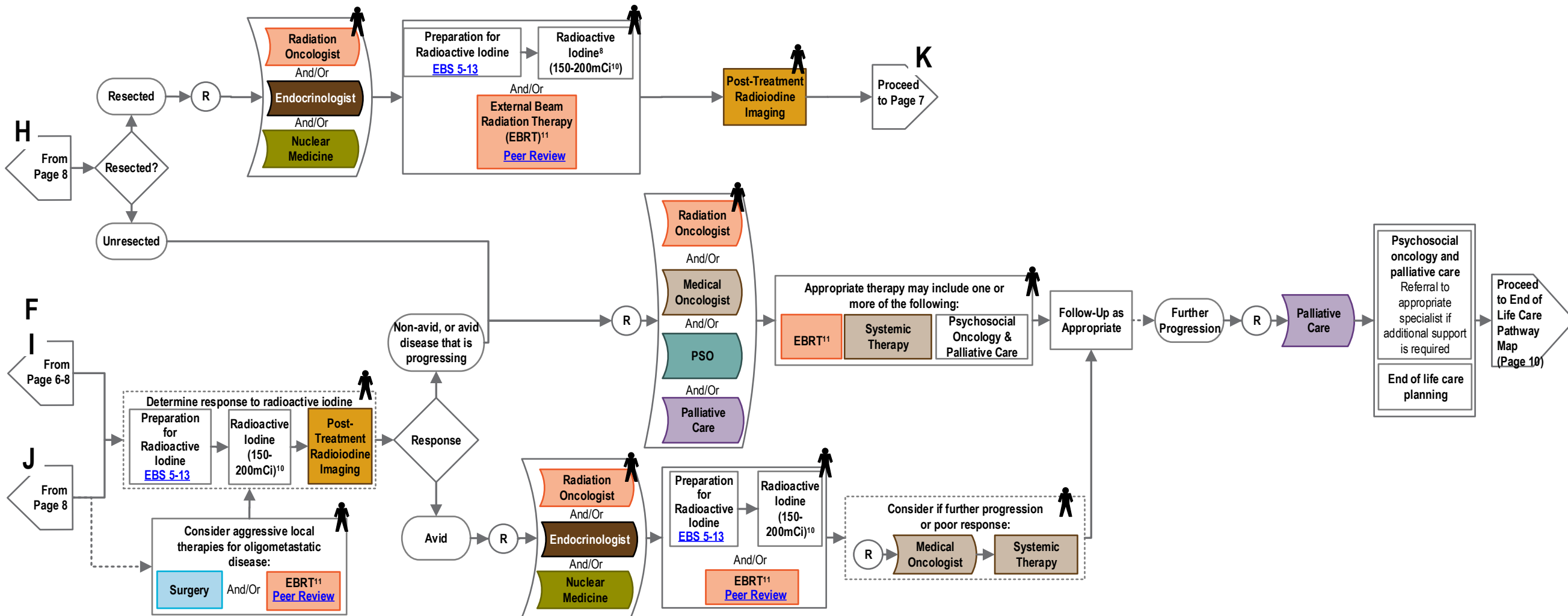
<sup>13</sup> Indications for PET Scan include: recurrent or persistent disease suspected on the basis of an elevated and/or rising thyroglobulin level(s) but standard imaging studies, including I-131 scan and/or neck ultrasound, are negative or equivocal.



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<sup>11</sup> Patient receiving external beam radiation therapy (EBRT) should be referred to a Registered Dietitian and Speech Language Pathologist.

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**Pathway Map Target Population:**  
Individuals with cancer approaching end of life, and their families.

While this section of the pathway map is focused on the care delivered at the end of life, the palliative care approach begins much earlier on in the illness trajectory. Refer to [Screen, Assess & Plan](#) within the Psychosocial & Palliative Care Pathway Map

**Triggers that suggest patients are nearing the last few months and weeks life**

- ECOG/Patient-ECOG/PRFS = 4 OR
- PPS ≤ 30
- Declining performance status/functional ability
- Gold Standards Framework indicators of high mortality risk

[Screen, Assess, Plan, Manage and Follow-Up](#)

+

**End of Life Care planning and implementation**  
Collaboration and consultation between specialist-level care teams and primary care teams

### End of Life Care

- Revisit Advance Care Planning**
  - Ensure the patient has determined who will be their Substitute Decision Maker (SDM)
  - Ensure the patient has communicated to the SDM his/her wishes, values and beliefs to help guide that SDM in future decision making
- Discuss and document goals of care with patient and family**
  - Assess and address patient and family's information needs and understanding of the disease, address gaps between reality and expectation, foster realistic hope and provide opportunity to explore prognosis and life expectancy, and preparedness for death
  - Introduce patient and family to resources in community (e.g., day hospice programs)
- Develop a plan of treatment and obtain consent**
  - Determine who the person wants to include in the decision making process (e.g., substitute decision maker if the person is incapable)
  - Develop a plan of treatment related to disease management that takes into account the person's values and mutually determined goals of care
  - Obtain consent from the capable person or the substitute decision maker if the person is incapable for an end-of-life plan of treatment that includes:
    - Setting for care
    - Resuscitation status
    - Having, withholding and or withdrawing treatments (e.g. lab tests, medications, etc.)
- Screen for specific end of life psychosocial issues**
  - Specific examples of psychological needs include: anticipatory grief, past trauma or losses, preparing children (young children, adolescents, young adults), guardianship of children, death anxiety
  - Consider referral to available resources and/or specialized services
- Identify patients who could benefit from specialized palliative care services (consultation or transfer)**
  - Discuss referral with patients and family
- Proactively develop and implement a plan for expected death**
  - Explore place-of-death preferences and assess whether this is realistic
  - Explore the potential settings of dying and the resources required (e.g., home, residential hospice, palliative care unit, long term care or nursing home)
  - Anticipate/Plan for pain & symptom management medications and consider a Symptom Response Kit (SRK) for unexpected pain & symptom management
  - Preparation and support for family to manage
  - Discuss emergency plans with patient and family (who to call if emergency in the home or long-term-care or retirement home)
- Home care planning**
  - Connect with CCAC early (not just for last 2-4 weeks)
  - Ensure resources and elements in place
  - Consider a Symptom Response Kit (SRK) with access to pain, dyspnea and delirium medication
  - Identify family members at risk for abnormal/complicated grieving and connect them proactively with bereavement resources

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