SUMMARY STAGE 2018
GENERAL CODING INSTRUCTIONS
APRIL 2018

Effective with cases diagnosed January 1, 2018 and forward

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Publication History

The original 2-digit Historic Coding was prepared for the National Cancer Institute End Results Group by an Extent of Disease Advisory Group. While this code had been in use since the early 1950s, it was not printed as a formal document until 1967.

The 1977 Summary Staging Guide was prepared by the Demographic Analysis Section of the National Cancer Institute and was edited by Evelyn M. Shambaugh and Mildred A. Weiss. This manual has been reprinted numerous times in the ensuing years.

The Summary Staging Guide 2000 (SS2000) was a follow-on to the two previous staging versions, Summary Stage 1977 and historic stage. SS2000 updated medical terminology and newer concepts of stage. In order to document the SS2000 changes, footnotes designated terms that changed their stage designation and what they would have been in the two previous versions.

SUMMARY STAGE

Summary Stage is the most basic way of categorizing how far a cancer has spread from its point of origin. Historically, Summary Stage has also been called General Stage, California Stage, historic stage, and SEER Stage.

The 2018 version of Summary Stage applies to every site and/or histology combination, including lymphomas and leukemias.

Summary Stage uses all information available in the medical record; in other words, it is a combination of the most precise clinical and pathological documentation of the extent of disease. Many central registries report their data by Summary Stage as the staging categories are broad enough to measure the success of cancer control efforts and other epidemiologic efforts.

There are six main categories in Summary Stage, each of which is discussed in detail. In addition, the main category of Regional stage is subcategorized by the method of spread. The code structure is:

Code	Definition
0	In situ
1	Localized only
2	Regional by direct extension only
3	Regional lymph nodes only
4	Regional by BOTH direct extension AND lymph node involvement
7	Distant site(s)/node(s) involved
8	Benign/borderline*
9	Unknown if extension or metastasis (unstaged, unknown, or unspecified) Death certificate only case

*****Applicable for the following SS2018 chapters: Brain, CNS Other, Intracranial Gland

Note: For SS2018, code 5 for "Regional, NOS" can no longer be coded. Code 5 (Regional, NOS) is still applicable for SS2000.

GUIDELINES BY STAGE

Code 0: In situ

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. In situ means "in place". The technical definition of in situ is the presence of malignant cells within the cell group from which they arose. There is no penetration of the basement membrane of the tissue and no stromal invasion. Generally, a cancer begins in the rapidly dividing cells of the epithelium or lining of an organ and grows from the inside to the outside of the organ. An in situ cancer fulfills all pathological criteria for malignancy except that it has not invaded the supporting structure of the organ or tissue in which it arose.
   Note: If the pathology report indicates an in situ tumor but there is evidence of positive lymph nodes or distant metastases, code to the regional nodes/distant metastases.

2. An in situ diagnosis **can only be made microscopically**, because a pathologist must identify the basement membrane and determine that it has not been penetrated. If the basement membrane has been disrupted (in other words, the pathologist describes the tumor as microinvasive, microinvasion), the case is no longer in situ and is at least localized (code 1).

3. Pathologists have many ways of describing in situ cancer
   - Intracystic
   - Intra-epithelial
   - No penetration below the basement membrane
   - No stromal invasion
   - Non-infiltrating
   - Noninvasive
   - Pre-invasive

4. Organs and tissues that have no epithelial layer cannot be staged as in situ, since they do not have a basement membrane.

5. Code 0 is not applicable for the following Summary Stage chapters

   - Bone
   - Brain
   - Cervical Lymph Nodes, Occult Head and Neck
   - CNS Other
   - Corpus Sarcoma
   - Heart, Mediastinum and Pleura
   - HemeRetic
   - Ill-defined other
   - Kaposi Sarcoma
   - Lymphoma
   - Lymphoma Ocular Adnexa
   - Mycosis Fungoides
   - Myeloma Plasma Cell Disorder
   - Pleural Mesothelioma
   - Primary Cutaneous Lymphoma (non-MF and SS)
   - Retinoblastoma
   - Retroperitoneum
   - Soft Tissue

Code 1: Localized

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. A localized cancer is defined as
    a. Malignancy limited to the site of origin
    b. Spread no farther than the site of origin in which it started
    c. Infiltration past the basement membrane of the epithelium into parenchyma (the functional part of the organ), but there is no spread beyond the boundaries of the organ

    Note: A tumor can be widely invasive or even show metastases within the organ itself and still be "confined to organ of origin" or localized in Summary Stage.

2. For organs that have definite boundaries (such as prostate, testis, or stomach) or sites where there is a clear line between the organ of origin and the surrounding region (such as breast or bladder), it is usually straightforward to determine if the cancer is localized.
    a. An exception is skin, because it is sometimes difficult to determine where the dermis ends and subcutaneous tissue begins.
    b. For many internal organs, it is difficult to determine whether the tumor is localized without surgery; however, with the increasing sophistication of imaging, it may be possible to determine whether a cancer is localized or regional without surgery.

3. It is important to know and recognize the names of different structures within the organ (such as lamina propria, myometrium, muscularis) so that a description of invasion or involvement of these structures will not be interpreted inappropriately, which may lead to over-staging.

4. Because Summary Stage uses both clinical and pathological information, it is important to review and read the pathology and operative report(s) for comments on gross evidence of spread, microscopic extension and metastases, as well as physical exam and diagnostic imaging reports for mention of regional or distant disease.
    a. If any of these reports provides evidence that the cancer has spread beyond the boundaries of the organ of origin, the case is not localized.
    b. If the pathology report, operative report and other investigations show no evidence of spread, the tumor may be assumed to be localized.

5. Code 1 is not applicable for the following Summary Stage chapters:
    - Cervical Lymph Nodes and Unknown Primary
    - Ill-defined other

Regional Stage: Codes 2-4

There are several codes to describe the different methods of regional spread of tumor.

Code	Definition
2	Regional by direct extension only
3	Regional lymph node(s) involved only
4	Regional by BOTH direct extension AND regional lymph node(s) involved

Clinicians may use some terms differently than cancer registrars. Therefore, it is important to understand the words used to describe the spread of the cancer and how they are used in staging. For example:

1. "Local" as in "carcinoma of the stomach with involvement of the local lymph nodes." Local nodes are the first group of nodes to drain the primary site and often are referred to as "regional" nodes. Unless evidence of distant or regional spread is present, such a case should be staged as regional, lymph node(s) involved only, assign 3.

2. "Metastases" as in "carcinoma of lung with peribronchial lymph node metastases". Metastases in this sense means involvement by tumor. The name of the involved lymph node will determine whether it is a regional node or distant node. In this case, it would be a regional node. It is important to learn the names of regional nodes for each primary site.

Code 2: Regional by direct extension only

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. Regional stage by direct extension is perhaps the broadest category as well as the most difficult to properly identify. The brief definition is direct tumor extension beyond the limits of the site of origin. Although the boundary between localized and regional tumor extension is usually well-identified, the boundary between regional and distant spread is not always clear and can be defined differently by physicians in various specialties.

2. Cancer becomes regional by direct extension when there is potential for spread by more than one vascular supply route. For example, if the tumor goes outside of the wall and invades another organ, it regional by direct extension.

3. The formal (scientific) definition of regional used by surgeons is that area extending from the periphery of an involved organ that lends itself to removal en bloc with a portion of, or an entire organ with outer limits to include at least the first level nodal basin. However, en bloc resection (removal of multiple organs or tissues in one piece at the same time) is not always feasible or may have been shown not to be necessary. For example, many clinical trials have shown that lumpectomy or modified radical mastectomy has equivalent survival to the very disfiguring radical mastectomy for treatment of breast cancer.

4. In contrast, radiation oncologists define the term regional as including any organs or tissues encompassed in the radiation field used to treat the primary site and regional lymph nodes.

5. For primary sites that have “walls” (e.g. colon, rectum), regional by direct extension is invasion through entire wall of organ into surrounding organs and/or adjacent tissues, direct extension or contiguous spread. For those primary sites without defined walls, regional by direct extension is when the tumor has spread beyond the primary site or capsule into adjacent structures.

6. Do NOT use code 2 if there is direct extension and also regional nodes positive (see code 4).

7. Code 2 is not applicable for the following Summary Stage chapters:
   - Cervical Lymph Nodes and Unknown Primary
   - HemeRetic
   - Ill-defined other
   - Myeloma Plasma Cell Disorder

Code 3: Regional lymph nodes only

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. Regional lymph nodes are listed for each chapter/site.
    a. If a lymph node chain is not listed in code 3, then the following resources can be used to help identify regional lymph nodes:
        i. Appendix I
        ii. Anatomy textbook
        iii. ICD-O manual
        iv. Medical dictionary (synonym)
2. If no preoperative treatment was administered and there is a discrepancy between clinical information and pathological information about the same lymph nodes, pathological information takes precedence. It is not necessary to biopsy every lymph node in the suspicious area to disprove involvement. Use the following priority order:
    a. Pathology report
    b. Imaging
        i. If nodes are determined positive based on imaging and then confirmed to be negative on pathological exam, treat the regional nodes as negative when assigning Summary Stage
    c. Physical exam
        i. If nodes are determined positive based on physical exam and then confirmed to be negative on pathological exam, treat the regional nodes as negative when assigning Summary Stage
3. If the patient receives neoadjuvant (preoperative) systemic therapy (chemotherapy, immunotherapy) or radiation therapy, code the clinical information if that is the most extensive lymph node involvement documented. If the post-neoadjuvant surgery shows more extensive lymph node involvement, code the regional nodes based on the post-neoadjuvant information.
4. For solid tumors, the terms “fixed” or “matted” and “mass in the hilum, mediastinum, retroperitoneum, and/or mesentery” (with no specific information as to tissue involved) are recorded as involvement of lymph nodes.
    a. Other terms, such as “palpable,” “enlarged,” “visible swelling,” “shotty,” or “lymphadenopathy” should be ignored for solid tumors. If these terms are used and there is no treatment to indicate lymph node involvement, treat the case as having no lymph node involvement.
5. The terms “homolateral,” “ipsilateral,” and “same side” are used interchangeably.

6. **Accessible lymph nodes:** For "accessible" lymph nodes that can be observed, palpated, or examined without instruments, such as the regional nodes for the breast, oral cavity, salivary gland, skin, thyroid, and other organs, look for some description of the regional lymph nodes. **A statement such as "remainder of examination negative" is sufficient to determine negative regional lymph nodes.**

7. **Inaccessible lymph nodes**: For certain primary sites, regional lymph nodes are not easily examined by palpation, observation, physical examination, or other clinical methods. These are lymph nodes within body cavities that in most situations cannot be palpated, making them inaccessible. Bladder, colon, corpus uteri, esophagus, kidney, liver, lung, ovary, prostate, and stomach are examples of inaccessible sites (this is not an all-inclusive list). When the tumor is Localized and standard treatment for a localized site is done, it is sufficient to determine negative regional lymph nodes.

8. Involved nodes found during sentinel lymph node procedures are classified as positive regional nodes.

    a. The sentinel lymph node is the first lymph node to receive lymphatic drainage from a primary tumor.

    b. If it contains metastatic tumor, this indicates that other lymph nodes may contain tumor. If it does not contain metastatic tumor, other lymph nodes are not likely to contain tumor. Occasionally there is more than one sentinel lymph node

9. For some chapters, ITCs are counted as positive regional nodes, while other chapters count them as negative. See the individual chapters to determine how to count ITCs.

10. Discontinuous (satellite) tumor deposits (peritumoral nodules) for colon, appendix, rectosigmoid and rectum can occur WITH or WITHOUT regional lymph node involvement. Assign the appropriate code according to guidelines in individual chapters. Tumor nodules in pericolic or perirectal fat without evidence of residual lymph node structures can be one of several aspects of the primary cancer: discontinuous spread, venous invasion with extravascular spread, or a totally replaced lymph node. If there are Tumor Deposits AND node involvement, code only the information on node involvement in Summary Stage.

11. If direct extension of the primary tumor into a regional lymph node is shown, code as involved regional nodes.

12. Any positive unidentified nodes included with the resected primary site specimen are to be coded as "Regional Lymph Nodes, NOS".

13. If the only indication of positive regional lymph node involvement in the record is the physician's statement of a positive N category from the TNM staging system or a stage from a site-specific staging system, use that information to code regional lymph node involvement.

14. If a specific chain of lymph nodes is named, but not listed as regional, first determine if the name is synonymous with a listed lymph node. Otherwise, assume distant lymph node(s) are involved.

15. Code 3 is not applicable for the following Summary Stage chapters:
    - Brain
    - CNS Other
    - HemeRetic
    - Ill-defined other (includes unknown primary site, C809)
    - Intracranial Gland
    - Lymphoma
        - Primary Cutaneous Lymphoma and Ocular Adnexal Lymphoma have separate chapters from Lymphoma and regional lymph node involvement is assigned in these chapters.

16. Do NOT use code 3 if there are regional nodes positive AND also direct extension (see code 4).

Code 4: Regional by BOTH direct extension AND regional lymph node(s) involved

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. For tumors that are regional (see definition of code 2) and have regional lymph node involvement (see definition of code 3), use code 4.

2. If there is only localized involvement (see definition of code 1) with regional lymph node involvement, assign code 3.

3. Code 4 is not applicable for the following Summary Stage chapters:
   - Brain
   - Cervical Lymph Nodes and Unknown Primary
   - CNS Other
   - HemeRetic
   - Ill-defined other (includes unknown primary site)
   - Intracranial Gland
   - Lymphoma
     - Primary Cutaneous Lymphoma and Ocular Adnexal Lymphoma have separate chapters from Lymphoma and regional lymph node involvement is assigned in these chapters.
   - Myeloma Plasma Cell Disorder

Code 7: Distant

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. Distant metastases are tumor cells that have broken away from the primary tumor, have travelled to other parts of the body, and have begun to grow at the new location. Distant stage is also called remote, diffuse, disseminated, metastatic, or secondary disease. The point is that in most cases there is no visible continuous trail of tumor cells involving only the primary site and the distant site.

2. Cancer cells can travel from the primary site in any of four ways.
   a. Extension from primary organ beyond adjacent tissue into next organ; for example, from the lung through the pleura into bone or nerve
   b. Travel in lymph channels beyond the first (regional) drainage area. Tumor cells can be filtered, trapped and begin to grow in any lymph nodes in the body.
   c. Hematogenous or blood-borne metastases. Invasion of blood vessels within the primary tumor (veins are more susceptible to invasion than thicker-walled arteries) allows escape of tumor cells or tumor emboli which are transported through the blood stream to another part of the body where it lodges in a capillary or arteriole. At that point, the tumor penetrates the vessel wall and grows back into the surrounding tissue.
   d. Spread through fluids in a body cavity.
      i. Example: malignant cells rupture the surface of the primary tumor and are released into the thoracic or peritoneal cavity. They float in the fluid and can land and grow on any tissue reached by the fluid.
      ii. This type of spread is also called implantation or seeding metastases. Some tumors form large quantities of fluid called ascites that can be removed, but the fluid rapidly re-accumulates. However, the presence of fluid or ascites does not automatically indicate dissemination. There must be cytologic evidence of malignant cells. A subsequent clinical diagnosis should be able to override a negative cytology. Malignant cells in ascites or peritoneal washings may not be distant involvement in some schemas.

3. Common sites of distant spread are liver, lung, brain, and bones, but they are not listed specifically for each chapter. These organs receive blood flow from all parts of body and thus are a target for distant metastases. However, if the primary site is adjacent to the liver, lung, brain or bone, it is important to review the Summary Stage chapter for the primary site to assure that the stage is not regional by direct extension.
   a. Example: Liver involvement from a primary in the gallbladder. It is likely that this is regional by direct extension rather than distant stage, since the gallbladder is adjacent to the liver.

4. Read the diagnostic imaging reports to determine whether the cancer involves the surface of the secondary organ, which could either be regional by direct (contiguous) extension or distant (if determined to be a discontiguous surface implant). If the tumor is identified growing from one organ onto/through the surface of the secondary organ, then it is contiguous extension. But if the tumor is only found in the parenchyma of the secondary organ well away from the primary organ, then it is discontinuous mets.

5. Hematopoietic, immunoproliferative, and myeloproliferative neoplasms are distant except as noted in the Summary Stage chapter.

6. Code 7 is not applicable for the following Summary Stage chapters:
   - Ill-defined other

Code 8: Benign/Borderline

1. Code 8 is for Benign/borderline neoplasms. Benign/borderline neoplasms are collected ONLY for the following chapters:

    - Brain
    - CNS Other
    - Intracranial Gland

2. If a registry collects other benign/borderline tumors that are not reportable, use code 9 for Summary Stage 2018. Code 8, at this time, will not be allowed for other sites.

Code 9: Unknown if extension or metastasis (unstaged, unknown or unspecified)

***Note*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

1. If the primary site is unknown (C809), then Summary Stage must be unknown.

2. Assign 9 very sparingly. If possible, contact the physician to see if there is more information about the case which is not in the record, such as diagnostic studies performed prior to admission or documentation in the physician's office record.

3. There will be cases for which sufficient evidence is not available to adequately assign a stage. Examples include:
   a. The patient expires before workup is completed
   b. A patient refuses a diagnostic or treatment procedure
   c. There is limited workup due to the patient's age or a simultaneous comorbid or contraindicating condition
   d. Only a biopsy is done and does not provide enough information to assign stage

4. Code 9 is to be used by default for Death Certificate Only (DCO) cases; however, assign the appropriate Summary Stage when specific staging information is available on a DCO.

GENERAL INSTRUCTIONS FOR USING THE SUMMARY STAGE 2018 MANUAL

The 2018 Summary Stage Manual chapters consist of a one-digit hierarchical code. In the United States, these chapters will apply to January 1, 2018 diagnoses and forward. It is extremely important to thoroughly read all clinical and pathological documentation, including imaging studies, operative and pathology reports, and the clinician's narrative descriptions of tumor involvement.

1. Updates to the Summary Stage 2018 manual were based on the AJCC 8th edition. Although the two systems are similar, there are many differences between them. For example, something that is regional in AJCC (recorded in T or N) may be distant in Summary Stage. If a structure or lymph node cannot be found in localized (code 1) or regional (codes 2-4), then review distant (code 7).

2. Summary Stage chapters apply to ALL primary sites and histologies. Most chapters are based on primary site, while some are based on histology alone, or both primary site and histology.

3. Chapter-specific guidelines take precedence over general guidelines. Always read the information pertaining to a specific primary site or histology chapter.

4. For ALL primary sites and histologies, Summary Stage is based on a combined clinical and operative/pathological assessment. Gross observations at surgery are particularly important when all malignant tissue cannot be, or was not, removed.
    a. In the event of a discrepancy between pathology and operative reports concerning excised tissue, priority is given to the pathology report

5. Summary Stage should include all information available within **four months of diagnosis** in the absence of disease progression or upon completion **of surgery(ies)** in first course of treatment, whichever is longer.

6. Clinical information, such as description of skin involvement for breast cancer and distant lymph nodes for any site, can change the Summary Stage. Be sure to review the clinical information carefully to accurately determine the extent of disease.
    a. If the operative/pathology information disproves the clinical information, use the operative/pathology information.

7. When multiple tumors are reported as a single primary, assign the greatest Summary Stage from any tumor.

8. Information for Summary Stage from a surgical resection **after neoadjuvant treatment may be used**, but ONLY if the extent of disease is greater than the pre-treatment clinical findings.

9. Disease progression, including metastatic involvement, known to have developed after the initial stage workup, should be excluded when assigning Summary Stage.

10. Autopsy reports are used in Summary Stage just as are pathology reports, applying the same rules for inclusion and exclusion.

11. T, N, M information may be used to assign Summary Stage when it is the only information available.

12. Use the medical record documentation to assign Summary Stage when there is a discrepancy between the T, N, M information and the documentation in the medical record. If you have access to the physician, please query to resolve the discrepancy.
    a. When there is doubt that documentation in the medical record is complete, assign Summary Stage corresponding to the physician staging

13. It is strongly recommended that the assessment of the Summary Stage be documented, as well as the choice of the Summary Stage assignment in a related STAGE text field on the abstract.

14. Death Certificate Only (DCO) cases and unknown primaries are assigned '9' for Summary Stage; however, assign the appropriate Summary Stage when specific staging information is available on a DCO.

GUIDELINES FOR SUMMARY STAGE

For efficient assignment of Summary Stage, here are some additional guidelines. Three of the Summary Stage categories can be ruled out quickly: in situ, distant, and localized.

Note 1: These guidelines do not apply to benign/borderline tumors.

***Note 2*: ALWAYS check site-specific SS2018 chapters for exceptions and/or additional information**

In situ

1. Rule out in situ stage disease. Carcinomas and melanomas are the only types of cancer that can be classified as in situ, since they arise only in organs with a basement membrane. Sarcomas are never described as in situ. A pathologist must examine the primary tissue and state that the tumor is in situ. If the cancer is anything except a carcinoma or melanoma, it cannot be in situ.

2. If there is any evidence of invasion (or extension beyond the basement membrane), nodal involvement or metastatic spread, the case is not in situ even if the pathology report so states.

Distant

3. Rule out distant disease. If distant metastases can be documented, there is no need to spend a great deal of time identifying local or regional spread. If distant metastases are recorded on imaging or needle biopsy, the stage is already determined and the patient does not need to undergo a lot of other tests.

4. Hematopoietic diseases, such as leukemia and multiple myeloma, are disseminated or distant at time of diagnosis.

5. Determine distant spread by reading the operative report for comments about seeding, implants, liver nodules, or other indications of metastases to determine if they are indicators of distant disease for a particular chapter. Read diagnostic reports for references to distant disease.

6. If nodes, organs, or adjacent tissues are not specifically mentioned for the primary site of the cancer in the description of the various staging categories, approximate the location and assign Summary Stage based on the stage listed for organs or tissues in the same anatomic area. If there is no match, assume the involved organ/tissues, nodes in question represents distant disease.

Localized if not in Situ or Distant above

7. Rule out that the cancer is “confined to the organ of origin.” In order for a lesion to be classified as localized, it must not extend beyond the outer limits of the organ, and there must be no evidence of metastases anywhere else.

8. Terms such as “blood vessel invasion” or “perineural lymphatic invasion” do not necessarily indicate that the cancer has spread beyond the primary organ – see specific chapter. If tumor at the primary site has invaded lymph or blood vessels, there is the potential for malignant cells to be transported throughout the body. Minor vessel or lymph-vascular invasion within the primary site is not a determining factor in changing Summary Stage unless there is definite evidence of tumor at distant sites.

Regional

9. If in situ, distant, and localized categories have been ruled out, the stage is regional.

10. For tissues, structures, and lymph nodes, assume ipsilateral unless stated to be contralateral or bilateral.

11. For solid tumors, if there are lymph nodes involved with the tumor, the stage is at least regional.

12. Determine whether it is regional by direct extension, regional nodes, or both.

Unknown if Extension or Metastasis

13. If there is not enough information in the record to categorize a case, and contacting the physician is not possible or has not resulted in additional information, the case must be recorded as unknown.

HOW TO ASSIGN SUMMARY STAGE

Answers to four basic questions will determine the correct Summary Stage.

1. **Where did the cancer start?**
   a. In what organ or tissue did the tumor originate?
   b. Is there a specific subsite of the organ involved?
   c. Information about the primary site and histology will usually come from the physical examination, a diagnostic imaging report, the operative report or the pathology report.
   d. Code the primary site and histology according to the rules in the *International Classification of Diseases for Oncology, Third Edition; 2018 Solid Tumor Rules; and the Hematopoietic Manual and Database.*
   e. In addition to recording this code in the primary site and histology fields on the cancer abstract, this code will be useful later in the staging process.

2. **Where did the cancer go?**
   a. Once the primary site is known, determine what other organs or structures are involved.
   b. Review the physical examination, diagnostic imaging reports, operative report(s), pathology report(s), and laboratory tests to identify any structures that are involved by cancer cells.
   c. Any of these reports can provide a piece of information that might change the stage.
   d. Note whether there is lymphatic or vascular invasion and/or spread, which organs are involved, and whether there is a single focus or multiple foci of tumor.
   e. It is important to know the names of the substructures within the primary site as well as the names of surrounding organs and structures. Note the names of any tissues that are reported to be involved by cancer cells.

3. **How did the cancer spread to the other organ or structure?**
   a. Did the cancer spread to the new organ/tissue in a continuous line of tumor cells from the primary site?
   b. If the pathologist can identify a trail of tumor cells from one organ to another, the stage may be regional by direct extension or distant by direct extension.
   c. Did the cancer spread by breaking away from the primary cancer and floating to the new site in the blood stream or body fluids (includes lymph within lymph vessels, blood within blood vessels, fluid outside of vessels such as pleural, pericardial, peritoneal)?
   d. If there is no direct trail of tumor cells from the primary organ to another site, the stage is probably distant.

4**. What are the stage and correct code for this cancer?**
   a. In the Summary Staging Manual 2018, go to the appropriate chapter that includes the ICD-O primary site and/or histology code identified earlier.
   b. Review the chapter looking for the names of the structures and organs that were reported as involved. If more than one structure or organ is involved, select the highest category that includes an involved structure.

DEFINITIONS OF TERMS USED IN THIS MANUAL

Adjacent connective tissue
These are unnamed tissues that immediately surround an organ or structure containing a primary cancer. Use this category when a tumor has invaded past the outer border (capsule, serosa, or other edge) of the primary organ into the organ's surrounding supportive structures but has not invaded into larger structures or adjacent organs. The structures considered in ICD-O as connective tissue include the following: adipose tissue; aponeuroses; arteries; blood vessels; bursa; connective tissue, NOS; fascia; fatty tissue; fibrous tissue; ganglia; ligaments; lymphatic channels (not nodes); muscle; nerves (spinal, sympathetic and peripheral); skeletal muscle; subcutaneous tissue; synovia; tendons; tendon sheaths; veins, and vessels, NOS. In general, these tissues do not have specific names. These tissues form the framework of many organs, provide support to hold organs in place, bind tissues and organs together, and serve as storage sites for nutrients.

Adjacent organs/structures
Organs are anatomic structures with specific physiologic functions other than (or in addition to) support and storage. There are two types:

- Unnamed: Contiguous growth into an unnamed organ lying next to the primary is coded to 'adjacent organs/structures.'
- Named: Connective tissues may be large enough to be given a specific name.
    - Examples: Blood, cartilage and bone are sometimes considered connective tissues, but in this manual, they would be listed separately.
    - Contiguous growth from one organ into an adjacent named structure would be coded to 'adjacent organs/structures.' For example, the brachial artery has a name, as does the broad ligament and both are structures.

Circulating Tumor Cells (CTCs)
See Isolated Tumor Cells

Contiguous
Directly adjacent; continuously adjoining; without lapse or intervening space; used in reference to regionalized cancers and extent of disease.

Cortex (adjective: cortical)
The external or outer surface layer of an organ, as distinguished from the core, or medulla, of the organ. In some organs, such as the adrenal glands, the cortex has a different function than the medulla.

Discontinuous
Tumors that are not connected; tumors in more than one area with normal tissue between them; often a sign of metastatic disease.

Disseminated Tumor Cells (DTCs)
See Isolated Tumor Cells

Direct extension
A term used in staging to indicate contiguous growth of tumor from the primary into an adjacent organ or surrounding tissue.

Distant
Refers to cancer that has spread from the original (primary) tumor to distant organs or distant lymph nodes.

Isolated tumor cells (ITCs), Circulating tumor cells (CTCs), Disseminated tumor cells (DTCs)
Isolated tumor cells (ITCs) are single tumor cells or small clusters of cells not more than 0.2 mm in greatest extent that can be detected by routine H and E stains or immunohistochemistry. An additional criterion has been proposed to include a cluster of fewer than 200 cells in a single histological cross-section. The same applies to cases with findings suggestive of tumor cells or their components by non-morphological techniques such as flow cytometry or DNA analysis.

ITCs do not typically show evidence of metastatic activity (e.g. proliferation or stromal reaction) or penetration of lymphatic sinus walls.

This definition also refers to circulating tumor cells (CTCs) and disseminated tumor cells (DTCs)

Localized
In medicine, describes disease that is limited to a certain part of the body. For example, localized cancer is usually found only in the tissue or organ where it began, and has not spread to nearby lymph nodes or to other parts of the body. Some localized cancers can be completely removed by surgery.

Medulla (adjective: medullary)
The medulla (central) portion of an organ, in contrast to the outer layer or cortex. It is sometimes called marrow. In some organs, such as bone, the medulla or marrow has a different physiologic role than the cortex.

Parenchyma
The parenchyma is the functional portion of an organ, in contrast to its framework or stroma. For example, the parenchyma of the kidney contains all the structures which filter and remove waste products from the blood. In general, malignancies tend to arise in the parenchyma of an organ.

Regional
In oncology, describes the body area right around a tumor.

Stroma
The stroma are the cells and tissues that support, store nutrients, and maintain viability within an organ. Stroma consists of connective tissue, vessels and nerves, and provides the framework of an organ. In general, spread of tumor to the stroma of an organ is still localized or confined to the organ of origin.

AMBIGUOUS TERMINOLOGY

Most of the time, registrars will find definitive statements of involvement; however, for those situations where involvement is described with non-definitive (ambiguous) terminology, use the guidelines below to interpret and determine the appropriate assignment of Summary Stage 2018.

Determination of the cancer stage is both a subjective and objective assessment by the physician(s) of how far the cancer has spread. When it is not possible to determine the extent of involvement because terminology is ambiguous, look at the documentation that the physician used to make informed decisions on how the patient is being treated. For example, assign Summary Stage 2018 based on involvement when the patient was treated as though adjacent organs or nodes were involved.

Use the following lists to interpret the intent of the clinician ONLY when further documentation is not available and/or there is no specific statement of involvement in the medical record. The physician's definitions/ descriptions and choice of therapy have priority over these lists because individual clinicians may use these terms differently.

***Note 1*:** Terminology in the chapter takes priority over this list. Some chapters interpret certain words as involvement; such as 'encasing' the carotid artery for a head and neck site or "abutment," "encases," or "encasement" for pancreas primaries.

Note 2: Use this list only for Summary Stage 2018 or EOD 2018.

Note 3: This is ***not*** the same list used for determining reportability as published in the SEER manual, Hematopoietic Manual or in Section 1 of the Standards for Oncology Registry Entry (STORE). This is ***not*** the same list of ambiguous terminology provided in the Solid Tumors Rules published and maintained by the SEER Program.

Use the following lists as a guide ***when no other information is available.***

Involved

Adherent	Incipient invasion
Apparent(ly)	Induration
Appears to	Infringe/infringing
Comparable with	Into*
Compatible with	Intrude
Consistent with	Most likely
Contiguous/continuous with	Onto*
Encroaching upon*	Overstep
Extension to, into, onto, out onto	Presumed
Features of	Probable
Fixation to a structure other than primary**	Protruding into (unless encapsulated)
Fixed to another structure**	Suspected
Impending perforation of	Suspicious
Impinging upon	To*
Impose/imposing on	Up to

Not Involved

Abuts	Extension to without invasion/involvement of
Approaching	Kiss/kissing
Approximates	Matted (except for lymph nodes)
Attached	Possible
Cannot be excluded/ruled out	Questionable
Efface/effacing/effacement	Reaching
Encased/encasing	Rule out
Encompass(ed)	Suggests
Entrapped	Very close to
Equivocal	Worrisome

* interpret as involvement whether the description is clinical or operative/pathological

** interpret as involvement of other organ or tissue

SUMMARY STAGE 2018 CHAPTERS

The Summary Stage site-specific chapters are based on historical staging, Summary Stage 2000 and the AJCC 8th Edition. Some of the AJCC 8th edition chapters were divided to line up with historical Summary Stage chapters.

SS Chapter	EOD Schema	AJCC Chap. No	AJCC Chapter Name
Adnexa Uterine Other	Adnexa Uterine Other	N/A	N/A
Adrenal Gland (including NET)	Adrenal Gland	76	Adrenal Cortical Carcinoma
Adrenal Gland (including NET)	NET Adrenal Gland	77	Adrenal-Neuroendocrine Tumors
Ampulla Vater (including NET)	Ampulla Vater	27	Ampulla of Vater
Ampulla Vater (including NET)	NET Ampulla of Vater	30	Neuroendocrine Tumors of the Duodenum and Ampulla of Vater
Anus	Anus	21	Anus
Appendix (including NET)	Appendix	19	Appendix-Carcinoma
Appendix (including NET)	NET Appendix	32	Neuroendocrine Tumors of the Appendix
Biliary Other	Biliary Other	N/A	N/A
Bladder	Bladder	62	Urinary Bladder
Bone	Bone Appendicular Skeleton	38	Bone
Bone	Bone Pelvis	38	Bone
Bone	Bone Spine	38	Bone
Brain	Brain	72	Brain and Spinal Cord
Breast	Breast	48	Breast
Buccal Mucosa	Buccal Mucosa	7	Lip and Oral Cavity
Cervical Lymph Nodes and Unknown Primary	Cervical Lymph Nodes and Unknown Primary Tumor of The Head and Neck	6	Cervical Lymph Nodes and Unknown Primary Tumors of Head and Neck
Cervix	Cervix	52	Cervix Uteri
CNS Other	CNS Other	72	Brain and Spinal Cord
Colon and Rectum (including NET)	Colon and Rectum	20	Colon and Rectum
Colon and Rectum (including NET)	NET Colon and Rectum	33	Neuroendocrine Tumors of the Colon and Rectum
Conjunctiva	Conjunctiva	65	Conjunctival Carcinoma
Corpus Carcinoma and Carcinosarcoma	Corpus Carcinoma	53	Corpus Uteri-Carcinoma and Carcinosarcoma

SS Chapter	EOD Schema	AJCC Chap. No	AJCC Chapter Name
Corpus Sarcoma (including Adenosarcoma)	Corpus Adenosarcoma	54	Corpus Uteri-Sarcoma
Corpus Sarcoma (including Adenosarcoma)	Corpus Sarcoma	54	Corpus Uteri-Sarcoma
Digestive Other	Digestive Other	N/A	N/A
Endocrine Other	Endocrine Other	N/A	N/A
Esophagus (including GE junction)	Esophagus (including GE junction) Squamous	16	Esophagus and Esophagogastric Junction
Esophagus (including GE junction)	Esophagus (including GE junction) (excluding Squamous)	16	Esophagus and Esophagogastric Junction
Extrahepatic Bile Ducts	Bile Ducts Distal	26	Distal Bile Duct
Extrahepatic Bile Ducts	Bile Ducts Perihilar	25	Perihilar Bile Ducts
Extrahepatic Bile Ducts	Cystic Duct	24	Gallbladder
Eye Other	Eye Other	N/A	N/A
Fallopian Tube	Fallopian Tube	55	Ovary, Fallopian Tube, and Primary Peritoneal Carcinoma
Floor of Mouth	Floor of Mouth	7	Lip and Oral Cavity
Gallbladder	Gallbladder	24	Gallbladder
Genital Female Other	Genital Female Other	N/A	N/A
Genital Male Other	Genital Male Other	N/A	N/A
GIST	GIST	43	Gastrointestinal Stromal Tumors
Gum	Gum	7	Lip and Oral Cavity
Heart and Mediastinum	Heart and Mediastinum	42	Soft tissue sarcoma of the Abdomen and Thoracic Visceral Organs
HemeRetic	HemeRetic	83	Leukemia
Hypopharynx	Hypopharynx	11	Oropharynx (p16-) and Hypopharynx
Ill-Defined Other	Ill-Defined Other	N/A	N/A
Intracranial Gland	Intracranial Gland	72	Brain and Spinal Cord
Intrahepatic Bile Ducts	Bile Ducts Intrahepatic	23	Intrahepatic Bile Duct
Kaposi Sarcoma	Kaposi Sarcoma	45	Soft tissue sarcoma of Unusual Sites and Histologies
Kidney Parenchyma	Kidney Parenchyma	60	Kidney
Kidney Renal Pelvis	Kidney Renal Pelvis	61	Renal Pelvis and Ureter
Lacrimal Gland/Sac	Lacrimal Gland	69	Lacrimal Gland Carcinoma
Lacrimal Gland/Sac	Lacrimal Sac	N/A	N/A
Larynx Glottic	Larynx Glottic	13	Larynx

SS Chapter	EOD Schema	AJCC Chap. No	AJCC Chapter Name
Larynx Other	Larynx Other	13	Larynx
Larynx SubGlottic	Larynx SubGlottic	13	Larynx
Larynx SupraGlottic	Larynx SupraGlottic	13	Larynx
Lip	Lip	7	Lip and Oral Cavity
Liver	Liver	22	Liver
Lung	Lung	36	Lung
Lymphoma	Lymphoma	79, 80	Hodgkin and Non-Hodgkin Lymphoma *(Adult and Pediatric chapters)*
Lymphoma	Lymphoma-CLL/SLL	79, 80	Hodgkin and Non-Hodgkin Lymphoma *(Adult and Pediatric chapters)*
Lymphoma Ocular Adnexa	Lymphoma Ocular Adnexa	71	Ocular Adnexal Lymphoma
Major Salivary Glands	Major Salivary Glands	8	Major Salivary Glands
Melanoma Conjunctiva	Melanoma Conjunctiva	66	Conjunctival Melanoma
Melanoma Head and Neck	Melanoma Head and Neck	14	Mucosal Melanoma of the Head and Neck
Melanoma Skin	Melanoma Skin	47	Melanoma of the Skin
Melanoma Uvea	Melanoma Choroid and Ciliary Body	67	Uveal Melanoma
Melanoma Uvea	Melanoma Iris	67	Uveal Melanoma
Merkel Cell Skin	Merkel Cell Skin	46	Merkel Cell Skin
Middle Ear	Middle Ear	N/A	N/A
Mouth Other	Mouth Other	7	Lip and Oral Cavity
Mycosis Fungoides	Mycosis Fungoides and Sézary Syndrome	81	Primary Cutaneous Lymphomas
Myeloma Plasma Cell Disorder	Plasma Cell Myeloma	82	Plasma Cell Myeloma and Plasma Cell Disorders
Myeloma Plasma Cell Disorder	Plasmacytomas	82	Plasma Cell Myeloma and Plasma Cell Disorders
Nasal Cavity and Paranasal Sinuses	Maxillary Sinus	12	Nasal Cavity and Paranasal Sinus
Nasal Cavity and Paranasal Sinuses	Nasal Cavity and Ethmoid Sinus	12	Nasal Cavity and Paranasal Sinus
Nasopharynx	Nasopharynx	9	Nasopharynx
Orbit	Orbital Sarcoma	70	Orbital sarcoma
Oropharynx	Oropharynx HPV-Mediated (p16+)	10	HPV-Mediated (p16+) Oropharyngeal Cancer
Oropharynx	Oropharynx (p16-)	11	Oropharynx (p16-) and Hypopharynx

SS Chapter	EOD Schema	AJCC Chap. No	AJCC Chapter Name
Ovary and Primary Peritoneal Carcinoma	Ovary	55	Ovary, Fallopian Tube, and Primary Peritoneal Carcinoma
Ovary and Primary Peritoneal Carcinoma	Primary Peritoneal Carcinoma	55	Ovary, Fallopian Tube, and Primary Peritoneal Carcinoma
Palate Hard	Palate Hard	7	Lip and Oral Cavity
Pancreas (including NET)	Pancreas	28	Exocrine Pancreas
Pancreas (including NET)	NET Pancreas	34	Neuroendocrine Tumors of the Pancreas
Parathyroid	Parathyroid	75	Parathyroid
Penis	Penis	57	Penis
Pharynx Other	Pharynx Other	N/A	N/A
Placenta	Placenta	56	Gestational Trophoblastic Neoplasms
Pleural Mesothelioma	Pleural Mesothelioma	37	Malignant Pleural Mesothelioma
Primary Cutaneous Lymphomas: Non-MF/SS	Primary Cutaneous Lymphomas: Non-MF/SS	81	Primary Cutaneous Lymphomas
Prostate	Prostate	58	Prostate
Respiratory Other	Respiratory Other	N/A	N/A
Retinoblastoma	Retinoblastoma	68	Retinoblastoma
Retroperitoneum	Retroperitoneum	44	Soft tissue sarcoma of the Retroperitoneum
Sinus Other	Sinus Other	N/A	N/A
Skin (except Eyelid)	Cutaneous Squamous Cell Carcinoma of Head and Neck	15	Cutaneous Squamous Cell Carcinoma of the Head and Neck
Skin (except Eyelid)	Skin Other	N/A	N/A
Skin Eyelid	Skin Eyelid	64	Eyelid Carcinoma
Small Intestine (including NET)	Small Intestine	18	Small Intestine
Small Intestine (including NET)	NET Duodenum	30	Neuroendocrine Tumors of the Duodenum and Ampulla of Vater
Small Intestine (including NET)	NET Jejunum and Ileum	31	Neuroendocrine Tumors of the Jejunum and Ileum
Soft Tissue	Soft Tissue Head and Neck	40	Soft tissue sarcoma of the Head and Neck
Soft Tissue	Soft Tissue Trunk and Extremities	41	Soft tissue sarcoma of the Trunk and Extremities
Soft Tissue	Soft Tissue Abdomen and Thoracic (excluding Heart, Mediastinum, Pleura)	42	Soft tissue sarcoma of the Abdomen and Thoracic Visceral Organs

SS Chapter	EOD Schema	AJCC Chap. No	AJCC Chapter Name
Soft Tissue	Soft Tissue Unusual Histologies/Sites	45	Soft tissue sarcoma of Unusual Sites and Histologies
Stomach (including NET)	Stomach	17	Stomach
Stomach (including NET)	NET Stomach	29	Neuroendocrine Tumors of the Stomach
Testis	Testis	59	Testis
Thymus	Thymus	35	Thymus
Thyroid (including Medullary)	Thyroid	73	Thyroid-Differentiated and Anaplastic Carcinoma
Thyroid (including Medullary)	Thyroid Medullary	74	Thyroid-Medullary
Tongue Anterior	Tongue Anterior	7	Lip and Oral Cavity
Trachea	Trachea	N/A	N/A
Urethra (including prostatic)	Urethra	63	Urethra
Urethra (including prostatic)	Urethra-Prostatic	63	Urethra
Urinary Other	Urinary Other	N/A	N/A
Vagina	Vagina	51	Vagina
Vulva	Vulva	50	Vulva