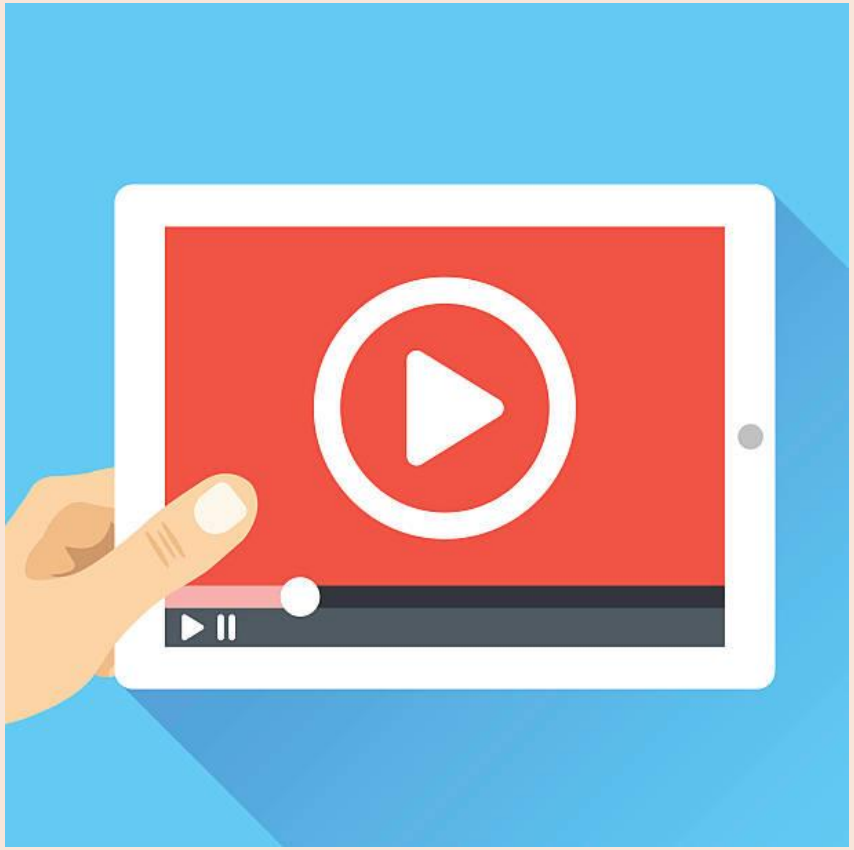
# LUNG
# EOD, SSDI & Grade

Presented by Melissa Riddle, ODS-C

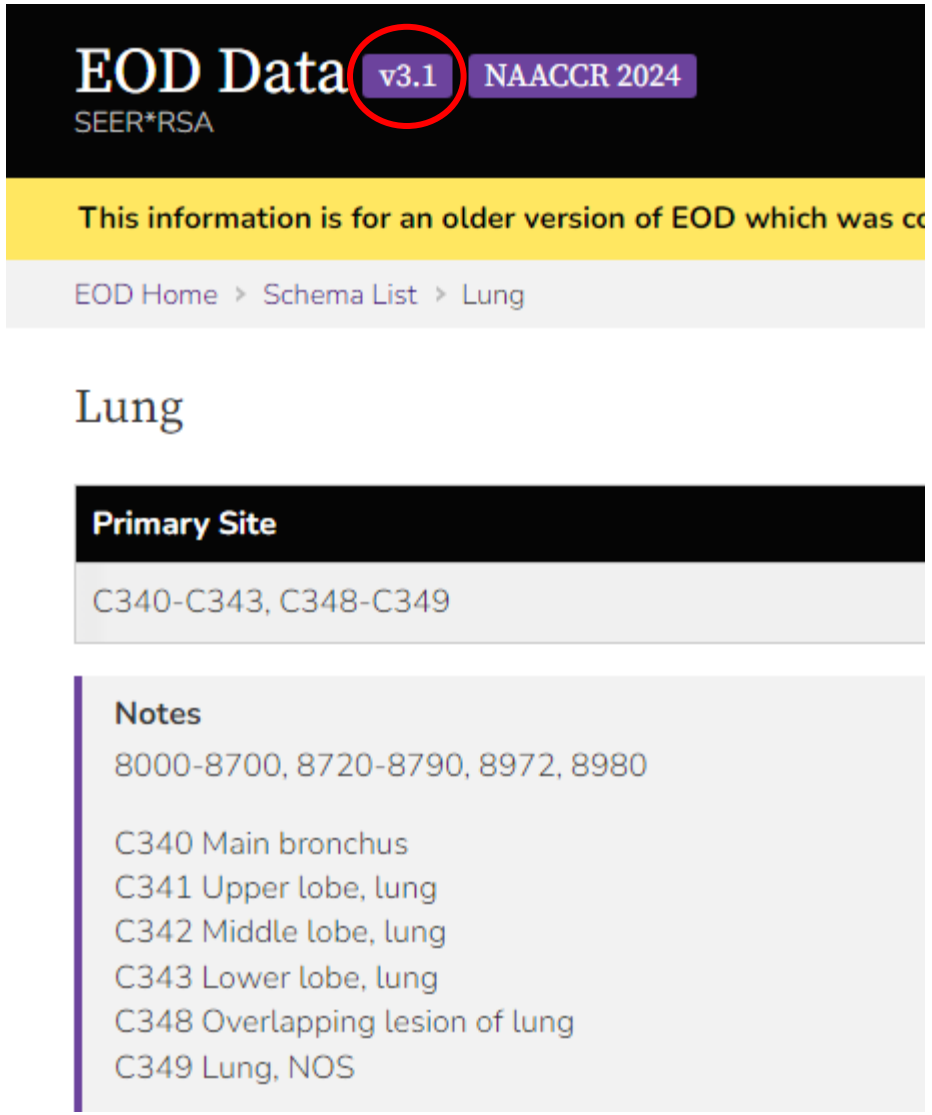
SHRI VIDEO TRAINING SERIES | Iowa Cancer Registry

March 2025

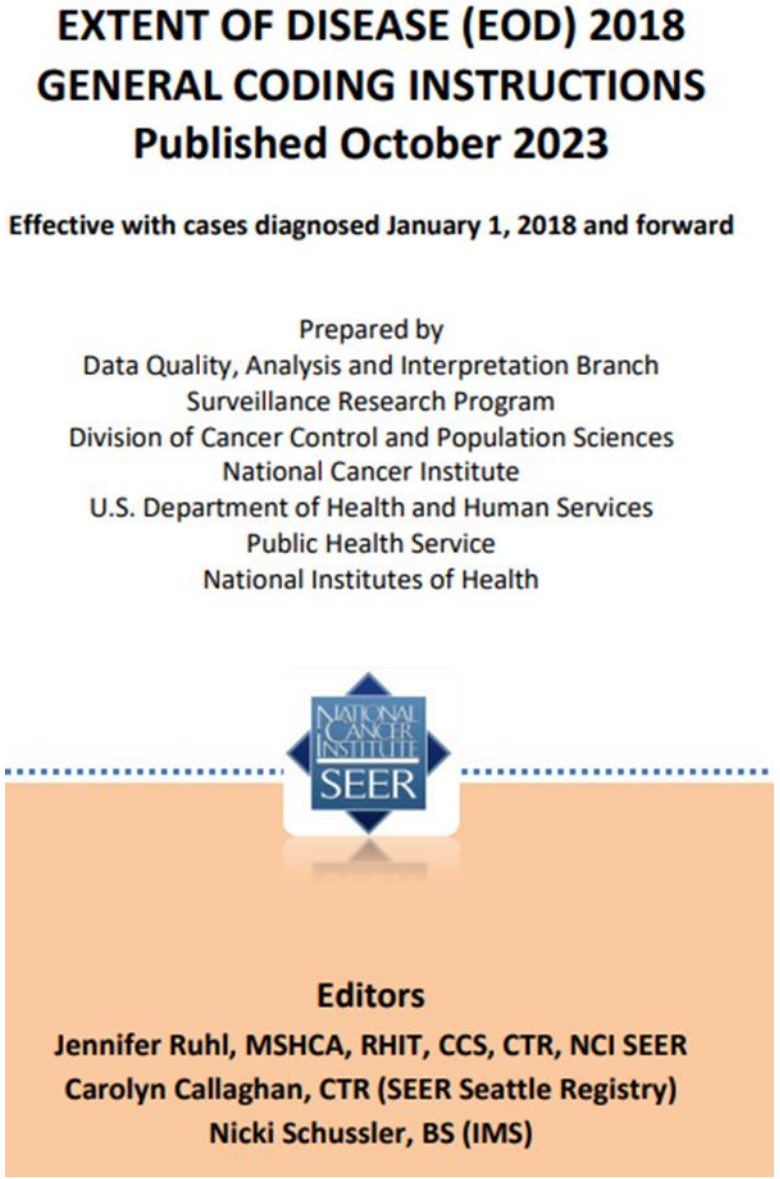


# LUNG C340-C349
# NAACCR 2024 – v3.1

EOD Primary Tumor
EOD Regional Lymph Nodes
EOD Metastasis



# EOD General Coding Instructions




https://seer.cancer.gov/tools/staging/eod/2018_EOD-General-Instructions_2024.pdf

# LUNG EOD Primary Tumor

***Note 1***: Bronchopneumonia (infection) not same as obstructive pneumonitis (atelectasis, inflammation, bronchiectasis) distal to an obstructing lesion.

***Note 2***: Ground glass opacities (GGO), ground glass nodules (GGN) and ground/glass lepidic (GG/L) are frequently observed on CT. See complete note.

***Note 3***: Code 100 only used under 4 criteria

***Note 4***: Code 200 is to be used for superficial spreading tumors only. Path report must state superficial spreading. These tumors are uncommon, use sparingly.  If in doubt, do not use this code.

# LUNG EOD Primary Tumor

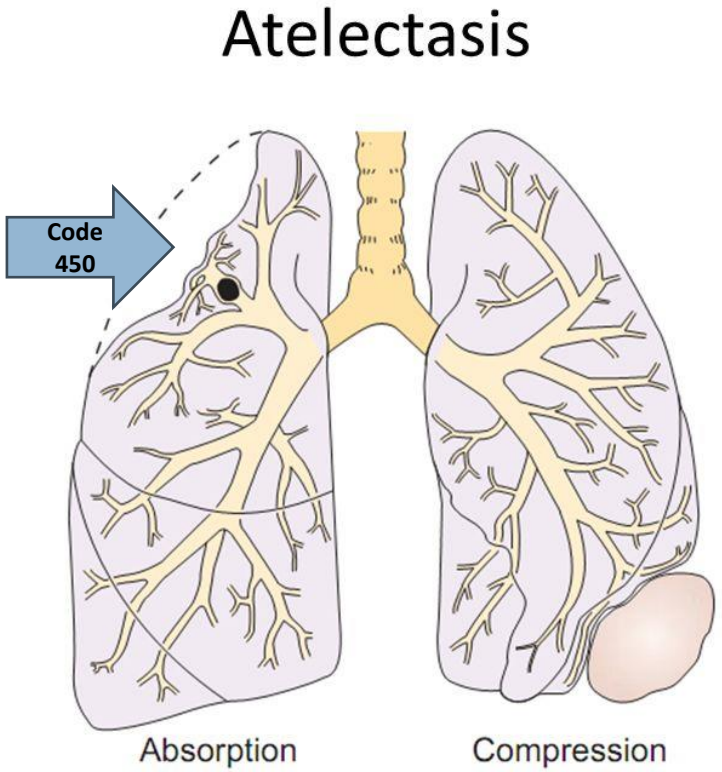
***Note 5***: Code 300 for localized cancer where size defines EOD. Not 100 (lepidic), 200 (superficial spread) or 400.

***Note 6***:  Atelectasis is failure of lung to expand or inflate completely. Caused by blocked airway, tumor, general anesthesia, pneumonia or other lung infections. Aka collapsed lung

- For staging: atelectasis must present with obstructing tumor

***Note 7***: Specific info about visceral pleural invasion captured in codes 450 (PL1, PL2, or NOS) and 500 (PL3). Elastic layer involvement has prognostic significance for lung cancer.

# Lung EOD Primary Tumor – Note 6




- Atelectasis caused by airway obstruction and absorption of air from the involved lung area **on the left** and by compression of lung tissue **on the right**.

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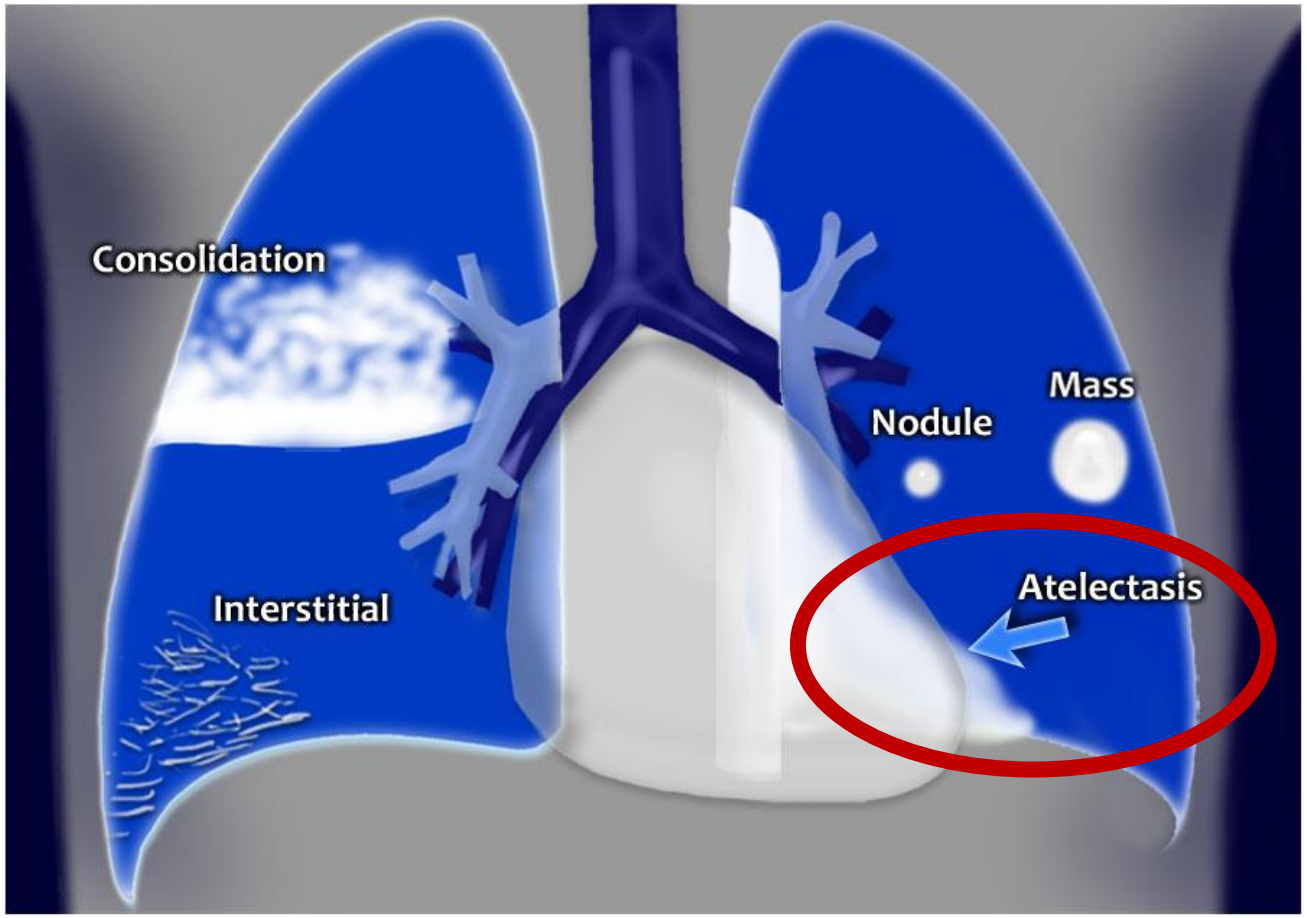
# Lung EOD Primary Tumor - Atelectasis



# Lung EOD Primary Tumor

***Note 8***: Penetration of visceral pleural indicates progression of invasion, even in small tumors. See rest of note.

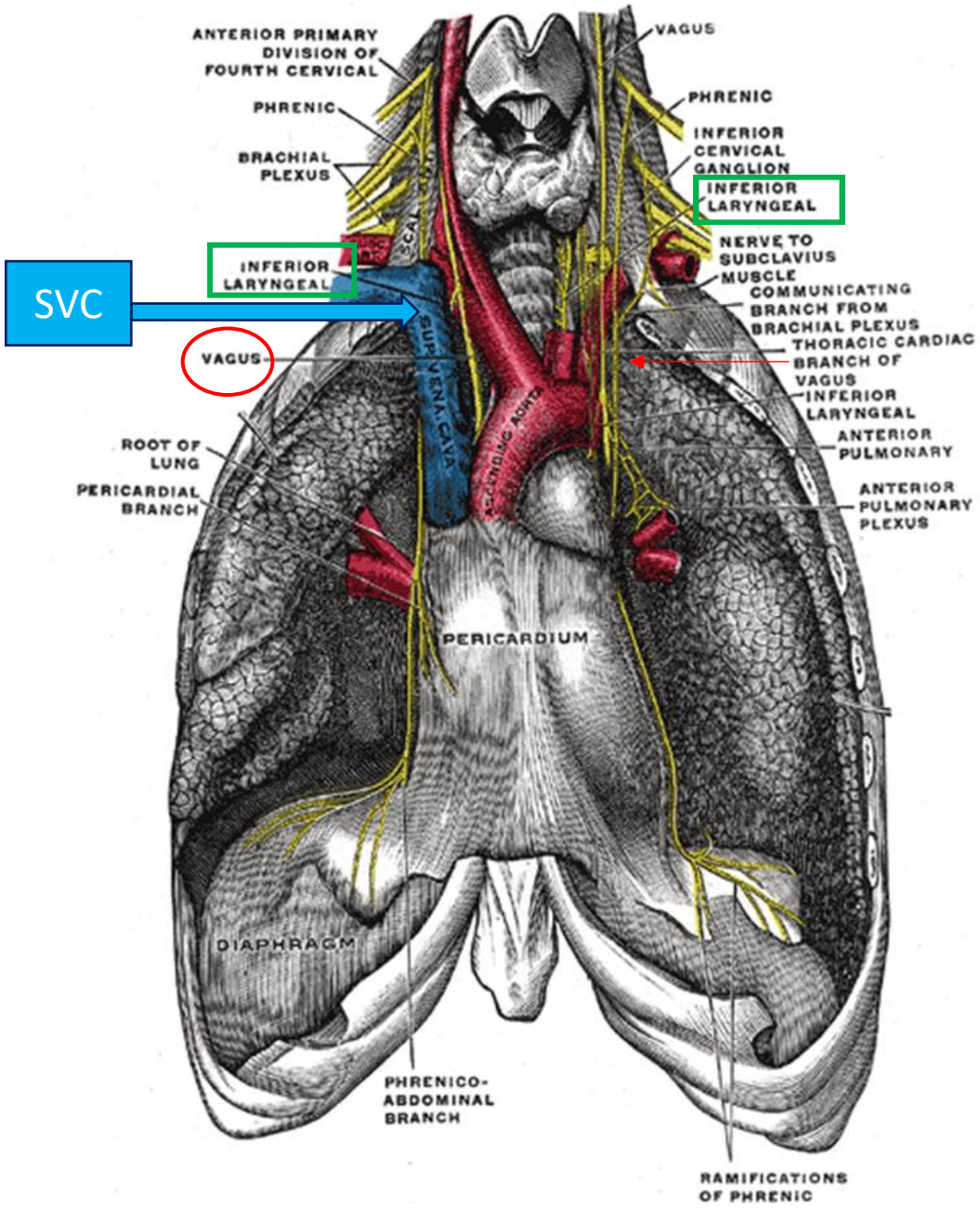
***Note 9*** – Separate slide

***Note 10*** – Separate slide

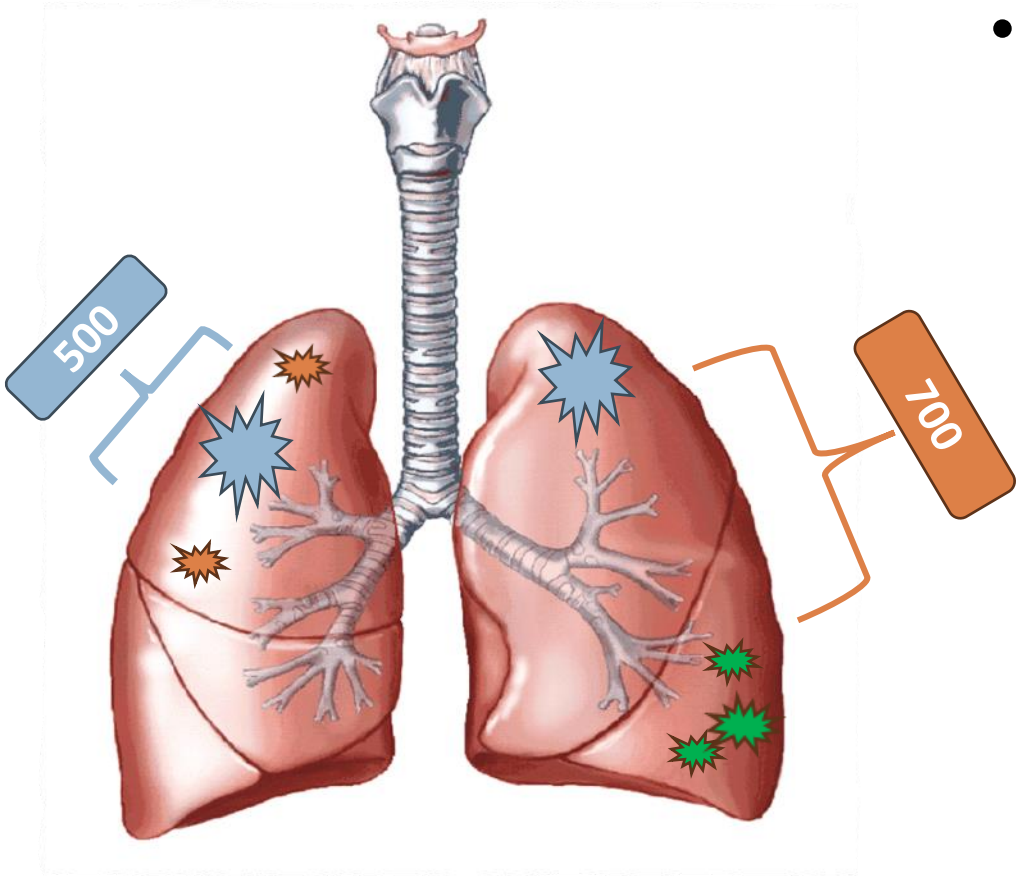
***Note 11***: Occult carcinoma occurs when tumor is proven by presence of malig cells or bronch washings, but no other evidence of tumor. EOD coded to 980, 000, 00.

# LUNG EOD Primary Tumor: Note 9

- Vocal cord paralysis, SVCS, and compression of trachea or esophagus
  - Direct Extension for primary tumor (lung) **Code 650**
    - Usually centrally located tumor or in the upper lobe
  - Due to LN involvement/compression code to **EOD LN 400**
    - Primary tumor is peripheral (not near any of the structures) it is usually due to LN
  - If unknown which is causing any of these code to **EOD LN 400**



# Separate Tumor Nodules – Note 10




- **Intrapulmonary metastases**
  - Defined as intrapulmonary mets in the **SAME** lung originating from a *single lung primary* at time to dx.
    - **Bx of tumor may or may not be performed**
    - **Histology of separate tumors must be the same**

      **[**If not all tumors are biopsied, ***ASSUME*** they are the same histology.]
  - Record from imaging reports and path reports
    - **500** – same lobe (Regional)
    - **700** – different ipsilateral lobe (Distant)
    - **EOD Mets** – contralateral lung

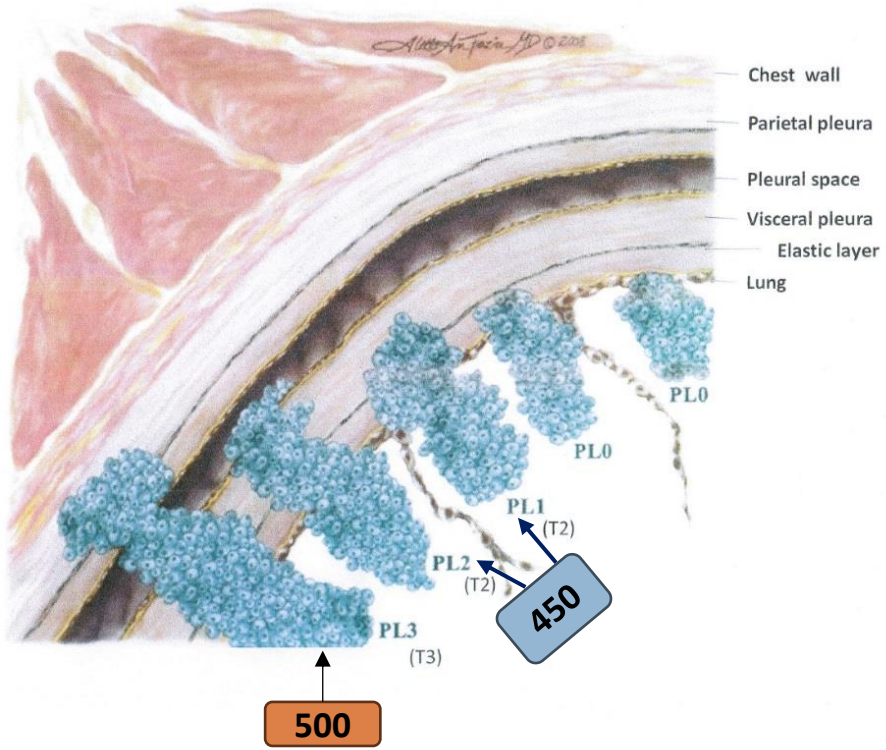
# EOD Primary Tumor

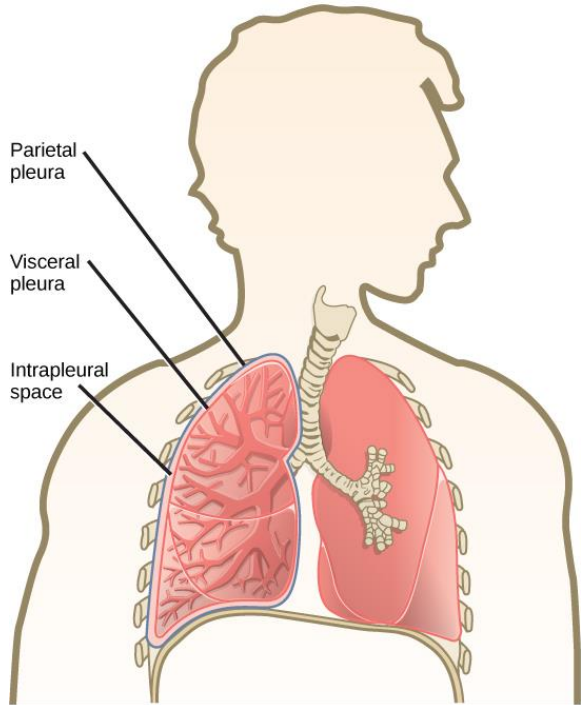
| Code | Description |
|---|---|
| **000** | In situ, Noninvasive, intraepithelial<br>SCIS = squamous cell carcinoma in situ<br>AIS = adenoca in situ: adenoca w/pure lepidic pattern </=3 cm |
| **100** | Minimally invasive adenoca<br>>with predominantly lepidic pattern meas </= 3 cm<br>>with invasive component meas </= 5 mm |
| **200** | Superficial spreading tumor, any size<br>>with invasive component limited to bronchial wall<br>>with or without proximal extension to MSB (uncommon) |
| **300** | Any size tumor; confined to lung; localized NOS |

# EOD Primary Tumor

| Code | Description |
|---|---|
| **400** | Any size tumor<br>>adjacent ipsilateral lobe (direct tumor invasion)<br>>confined to hilus<br>>MSB, NOS (w/o involvement of carina)<br>>including extension from other part of lung |
| **450** | Any size tumor<br>>atelectasis/obstructive pneumonitis [see *Note 1, Note 6*]<br>>pleural NOS<br>>Pulmonary ligament<br>>Visceral pleural (PL1 or PL2) [see *Note 7*] |
| **500** | Any size tumor<br>>Brachial plexus, inferior branches or NOS<br>>Chest wall (thoracic wall) separate lesion – see EOD mets)<br>>**Pancoast tumor** (superior sulcus syndrome) NOS<br>>Parietal pericardium, Pericardium, NOS<br>>Parietal pleural (PL3) [see *Note 8*]<br>>>Phrenic nerve<br>Separate tumor nodule(s) in **same lobe** as the primary [see *Note 10*] |

# Pleural Invasion



# EOD Primary Tumor

| Code | Description |
|---|---|
| **600** | Tumor limited to the carina |
| **650** | Blood vessel(s) (major)<br>>Aorta<br>>Azygos vein<br>>Pulmonary artery or vein<br>>**Superior vena cava** (SVC syndrome)<br>Carina from lung<br>**Compression of esophagus or trachea not specified as direct ext**<br>Esophagus<br>Mediastinum, extrapulmonary or NOS<br>Nerve(s)<br>>Cervical sympathetic (Horner's syndrome)<br>>**Recurrent laryngeal** (vocal cord paralysis)<br>>Vagus<br>Trachea |

# EOD Primary Tumor

| Code | Description |
|---|---|
| **675** | Any size tumor<br>>Adjacent rib, Rib NOS<br>>Skeletal muscle<br>>Sternum |
| **700** | Heart<br>Inferior vena cava<br>Neural foramina<br>Vertebra(e) (vertebral body)<br>Visceral pericardium<br>**Separate tumor nodule**(s) in **different ipsilateral lobe** [see *Note 10*]<br>Further contiguous extension |
| **800** | No evidence of primary tumor |
| **980** | Tumor proven by presence of **malig cells in sputum or bronchial washings** but not visualized by imaging or **bronch "occult' carcinoma**. [see *Note 11*] |
| **999** | Unknown; extension not stated<br>Primary cannot be assessed<br>Not documented in pt record; DCO |

# EOD Regional Lymph Nodes

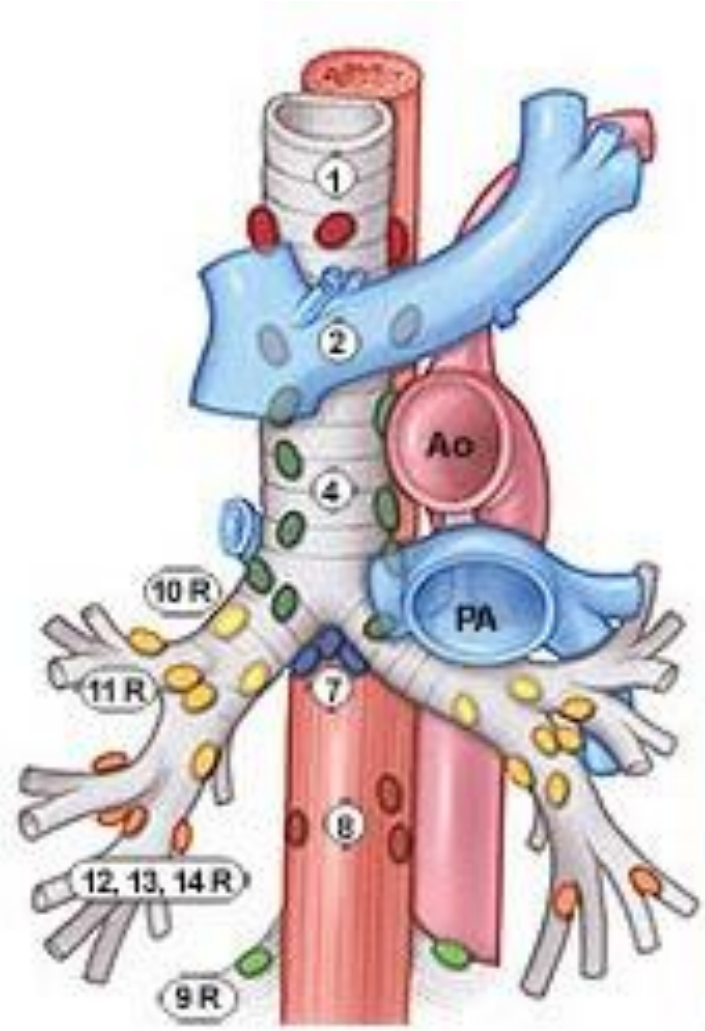
Lung

# EOD Regional LNs

***Note 1***: Code only regional nodes and nodes, NOS in this field.  Distant nodes are coded in EOD mets.

***Note 2***:  "Vocal cord paralysis," "superior vena cava syndrome," and "compression of the trachea or the esophagus" are classified as either direct extension from primary tumor or mediastinal lymph node involvement (code 400). See 3 bullet points.

***Note 3***: Code 800 if regional LNs are involved, NOS

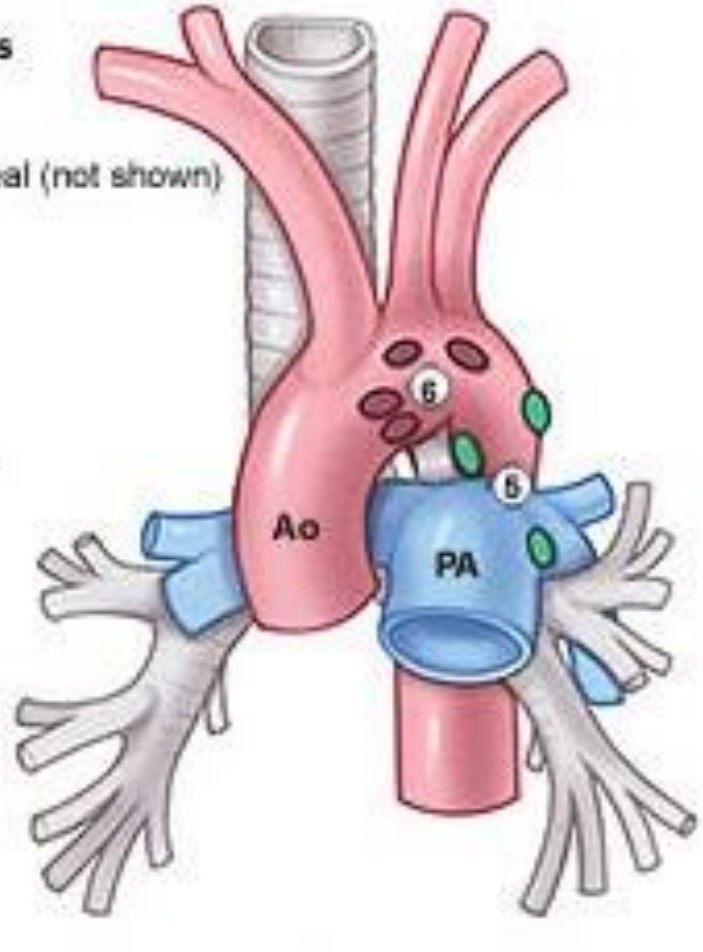



**Superior Mediastinal Nodes**
- 1 Highest Mediastinal
- 2 Upper Paratracheal
- 3 Pre-vascular & Retrotracheal (not shown)
- 4 Lower Paratracheal

**Aortic Nodes**
- 5 Subaortic
- 6 Para-aortic

**Inferior. Mediastinal Nodes**
- 7 Subcarinal
- 8 Paraesophageal
- 9 Pulmonary Ligament

**N1 Nodes**
- 10 Hilar
- 11 Interlobar
- 12 Lobar
- 13 Segmental
- 14 Subsegmental



# LUNG EOD Reg LNs

| Code | Description |
|---|---|
| **000** | No regional LN involvement |
| **300** | **IPSILATERAL** nodes only<br>Bronchial, hilar, intrapulmonary [interlobar, lobar, segmental, subsegmental]<br>Peri/parabronchial |
| **400** | **IPSILATERAL** nodes only<br>Carina (tracheobronchial) (tracheal bifurcation)<br>Mediastinal, ipsilateral or NOS<br>>Numerous mediastinal LNs here…<br>Peritracheal, NOS<br>>Azygos (lower peritracheal)<br>Precarinal<br>Pretracheal, NOS |

# Lung EOD Reg LNs

| Code | Description |
|---|---|
| **600** | **IPSILATERAL OR CONTRALATERAL**<br>Low cervical<br>Proximal root<br>Pulmonary root<br>Scalene (inferior deep cervical)<br>Sternal notch<br>Supraclavicular (transverse cervical) |
| **700** | **CONTRALATERAL OR BILATERAL**<br>Bronchial<br>Hilar<br>Mediastinal<br>>numerous named mediastinal nodes |
| **800** | Regional lymph node(s), NOS<br>Lymph node(s), NOS |
| **999** | Unknown; regional nodes(s) not stated<br>Regional nodes cannot be assessed<br>Not documented in patient record, DCO |

# Q&A

**ASK A SEER CTR #21095 5-15-2019**

**Question:** Can you take terms lymphadenopathy, mass, palpable, enlarged LNs for coding EOD Reg Nodes?

**Answer:** This change was done to be in line with AJCC. There are many reasons for lymph nodes to be enlarged, or for there to be lymphadenopathy. Although this is common with cancer (especially for lung), it's not always due to cancer. Also, it was determined that lymph node involvement was being coded as positive when it shouldn't have been, based on terminology like "lymphadenopathy," which is not necessarily a term that is diagnostic of cancer involvement, although it is commonly used by radiologists.

- **A clinician's interpretation (other than a radiologist) is needed to confirm whether lymphadenopathy is cancer involvement or not.**

# EOD General Instructions: LN Involvement

5. **Terms meaning lymph node involvement:** 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, unless there is a statement of involvement by the clinician or the patient was treated as though regional nodes were involved.

   *Example: Palpable axillary lymph nodes found, consistent with mets. Record as involvement of lymph nodes.*

   *Example: Enlarged renal hilar nodes found on CT, positive for cancer. Record as involvement of lymph nodes.*

   b. The terms "homolateral," "ipsilateral," and "same side" are used interchangeably.

# Lymph Node Text Examples

**Incomplete:** 4/28/2024 CT chest 19 mm mass Rt lung apex that abuts pleural surface, could represent malignancy. A 6x8 mm nodule along Rt minor fissure, most likely infrafissural LN. No pleural effusion. Mediastinal and Rt hilar adenopathy to 16 mm. Rad Onc: Metastatic carcinoma, probably lung primary. No TNM by MD. **EOD Reg Nodes 999**

**Complete**: "1/24/2024 RadTx CNSLT: cT3N2M1a SCC of presumed RUL with 3 nodules R lung and 1 nodule L lung. Bulky mediastinal adenopathy to 3.5 cm." The treating physician is calling adenopathy positive and has staged it N2. **EOD Reg Nodes 400**

# EOD Mets

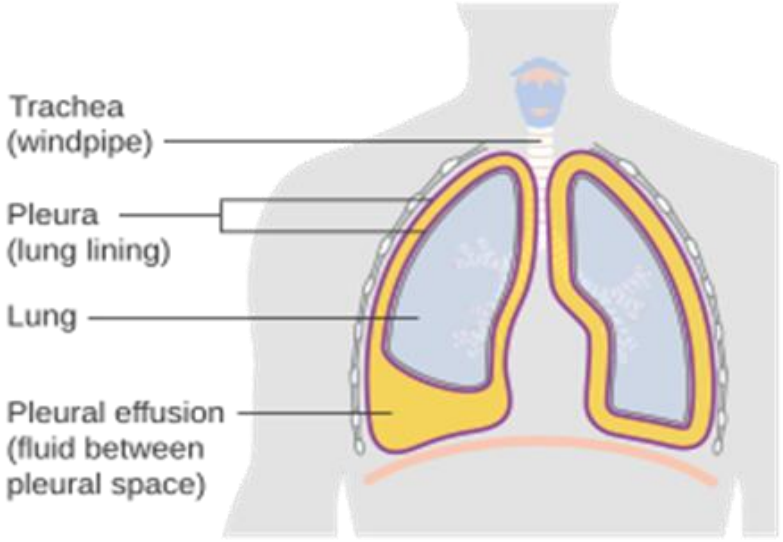
Lung

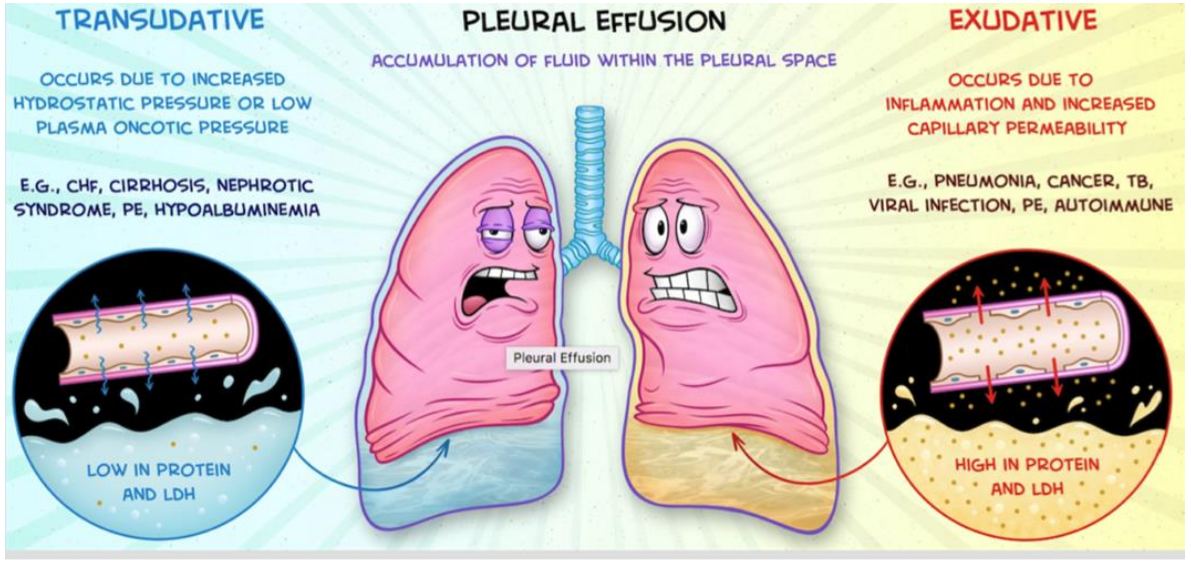
# EOD Mets

**Note:** Most pleural and pericardial effusions with lung cancer are due to tumor. In a few patients, however, multiple cytopathological examinations of pleural and/or pericardial fluid are negative for tumor, and the fluid is non-bloody and is not an exudate. Where these elements and clinical judgment dictate that the effusion is not related to the tumor, the effusion should be excluded as a staging element. Code 00 in the absence of any other metastasis.

# Pleural effusion

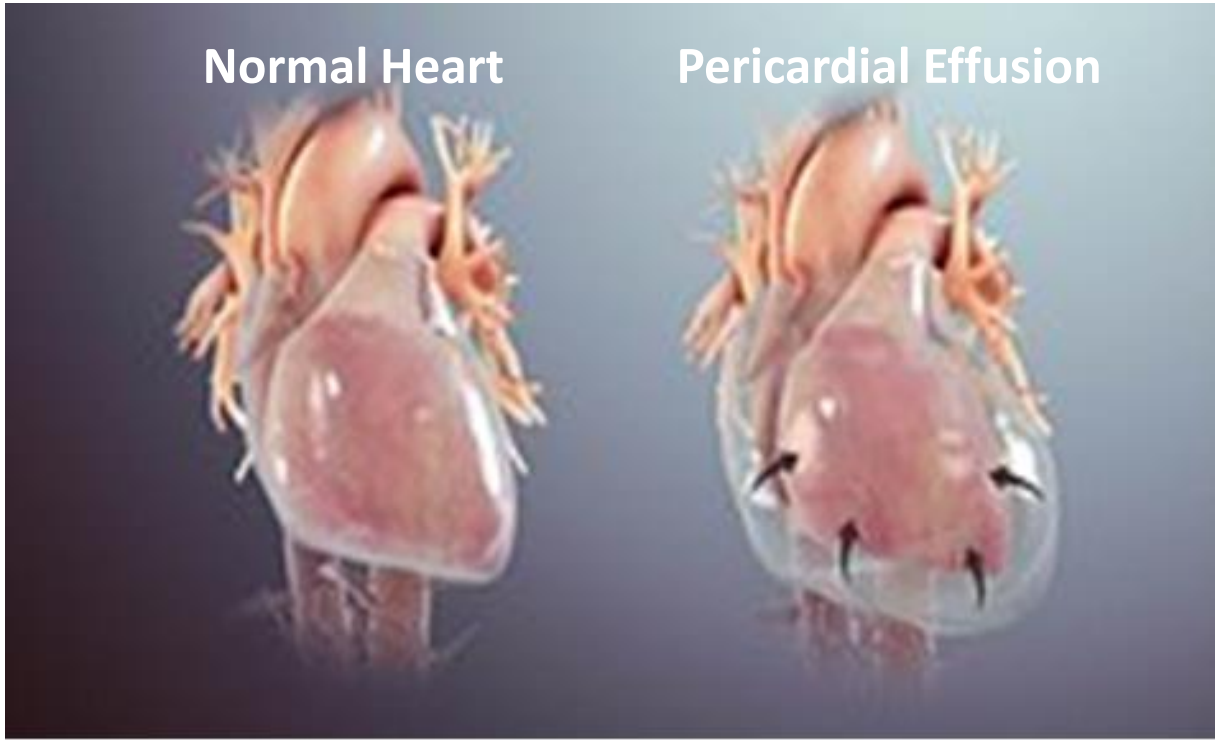
EOD Mets code 10



# Pericardial Effusion

- EOD Mets code 10



# EOD Mets

| Code | Description |
|---|---|
| **00** | No distant mets; unknown if distant mets |
| **10** | **Pericardial effusion** or **pleural effusion** (malig) (ipsilateral, contralateral, bilat, NOS); Pericardial nodules<br>Contralat lung/MSB; Contralat MSB<br>**Separate tumor nodule(s) in contral lung** |
| **20** | Single distant LN involved<br>>Cervical; >Distant LN, NOS |
| **30** | Single extrathoracic mets in a single organ |
| **50** | Multiple extrathoracic mets in a single organ or in multiple organs<br>Abd organs, skin of chest, separate lesion in chest wall or diaphragm.<br>Multiple distant LN(s): Cervical, Distant NOS<br>Carcinomatosis; Distant mets WITH or WITHOUT distant LN(s) |
| **70** | Distant mets, NOS |
| **99** | DCO |

# Site Specific Data Items (SSDI) v3.1

#3929 Separate Tumor Nodules

#3937 Visceral and Parietal Pleural Invasion

#3938 ALK Rearrangement [start 2021 dx]

#3939 EGFR Mutational Analysis [start 2021 dx]

# Separate Tumor Nodules

- Refers to a *single tumor* with intrapulmonary mets in ipsilateral (**same**) lung.
- Defined as intrapulmonary mets in same lobe or same lung originating from a *single lung primary* at time to dx.
- **Bx of tumor may or may not be performed**
- **Histology of separate tumors must be the same**
  - **[**If not all tumors are biopsied, ***ASSUME*** they are the same histology.]
- Record from imaging reports and path reports

# Separate Tumor Nodules

- Physician statement about separate tumor nodules in the same lung can be used to code data item **WHEN** no other information available
  - Contralateral tumor nodules are **NOT** coded here
- Intrapulmonary mets at the time of diagnosis are coded
  - Same or different lobe – **SAME** lung
  - Code separate tumor nodules of the **SAME** histologic type as primary
    - If not all nodules are biopsy assume that they are the same histology
- Other situations of multiple lesions that are **NOT** coded in this data item:
  - Secondary primary tumors (synchronous primaries)
  - Multifocal lung adenocarcinoma w/ ground glass/lepidic features
  - Diffuse pneumonic adenocarcinoma

See AJCC Chapter 36

# Separate Tumor Nodules

- If terminology is not readily identifiable as one of the previous situations for multiple tumors or foci – assign **code 7**
  - Multiple nodules/foci of tumor but not classified as intrapulmonary mets (STN) or synchronous tumors

- If imaging or resection performed and no mention of separate tumor nodules, **code 0**

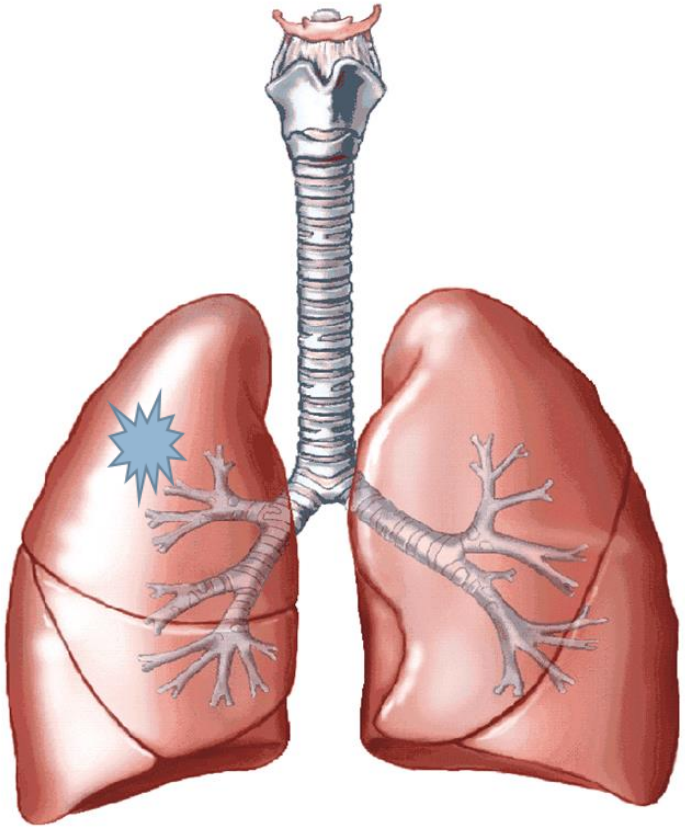
- No relevant imaging or resection of the primary, **code 9**

# Separate Tumor Nodules

SSDI – STN coding applies

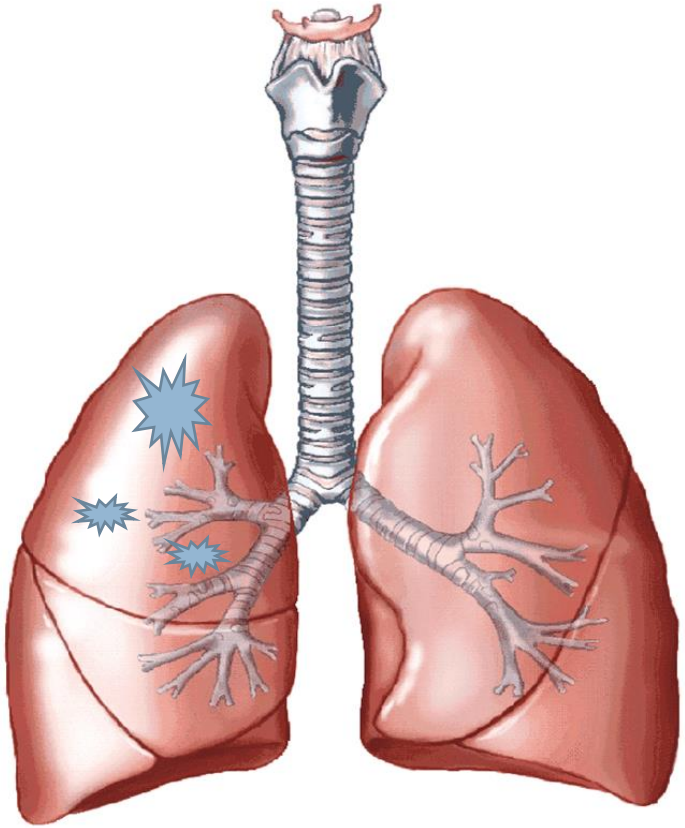
| Criterion | 2nd primary tumor | Multifocal GG/L nodules | Pneumonic-type adenoca | Single Tumor w/ STN |
|---|---|---|---|---|
| Imaging | 2+ distinct masses w/ characteristic lung cancer | Multiple GG or part-solid nodules | Patchy areas of GG and consolidation | Typical lung cancer with separate tumor nodules |
| Path | Different histologies | Adenoca with prominent lepidic component (varying degrees of AIS, MIA, LPA) | Same histology throughout (often invasive mucinous adenoca) | Distinct masses with same histology |
| TNM Class | Separate TNM staging for each | T based on highest T category with (m) suffix | T based on size or T3 if in single lobe, T4 or M1a if different ipsilat or contralat lobes | Location of separate nodule relative to primary – T3, T4, or M1a |
| Conceptual view | Unrelated tumors | Separate tumors with similarities | Single tumor, diffuse pulm involvement | Single tumor w/ intrapulmonary mets |

# Code 0



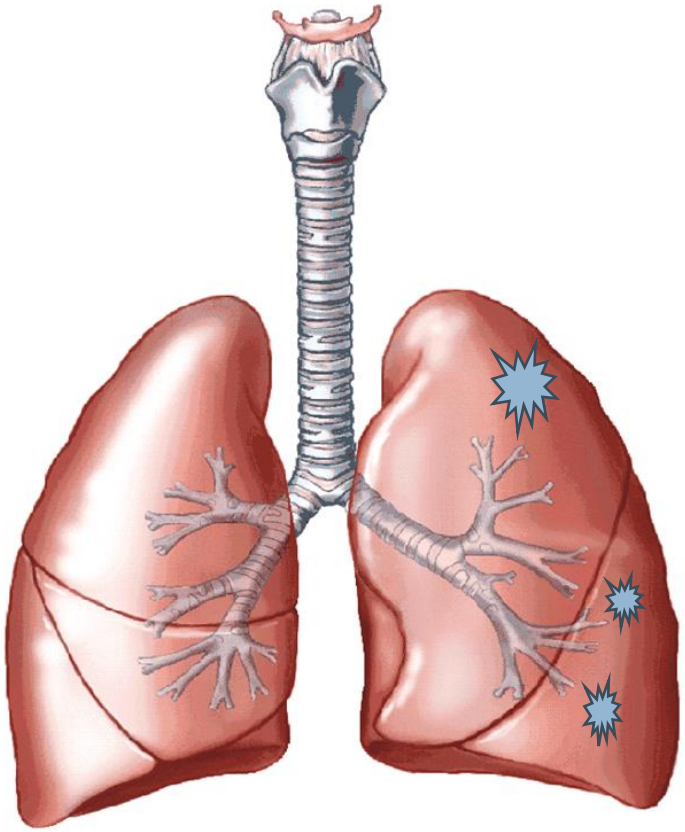
- No separate tumor nodules; single tumor only
- Separate tumor nodules of same histology type not identified/not present
- Intrapulmonary mets not present
- Multiple nodules described as multiple foci of adenoca in situ or minimally invasive adenoca.
  - Non-invasive (behavior /2)
- Notes 4 & 7

# Code 1



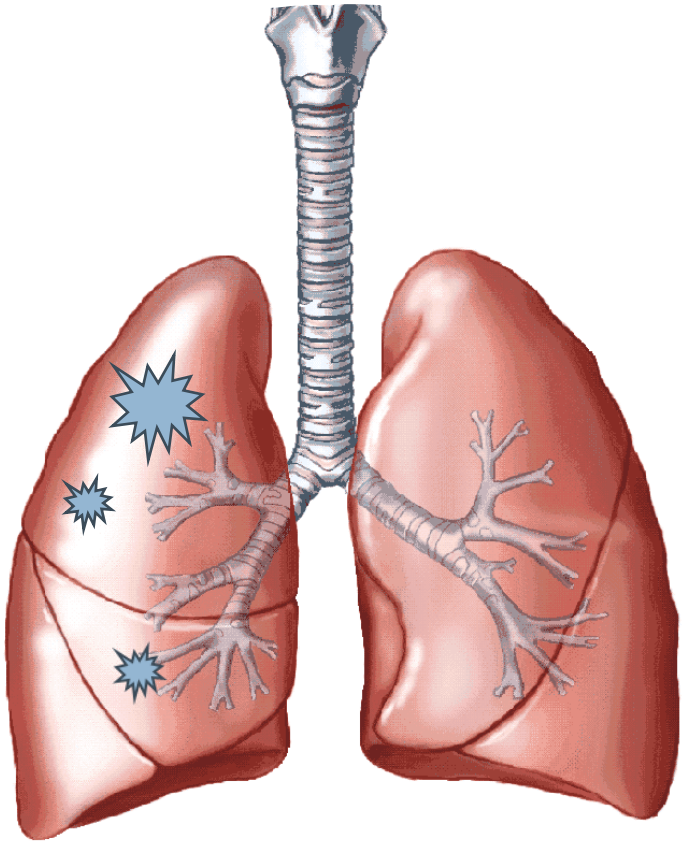
- Separate tumor nodules:
  - same histo type
  - same lobe
- Look at cT3

# Code 2



- Separate tumor nodules:
  - same histo type
  - same lung
  - different lobe
- Look at cT4

# Code 3



- Separate tumor nodules:
  - same histo type
  - same lung
  - Same **AND** different lobes

# Separate Tumor Nodules

| Code | Description |
|---|---|
| **4** | Separate tumor nodules of same histo type in ipsilat lung, **unknown** if same or different lobe(s) |
| **7** | Multiple nodules or foci of tumor present, not classifiable based on *Notes 3 and 4* |
| **9** | Not documented in med record<br>Separate tumor nodules not assessed or unknown if assessed |

# Forum Q & A

**Q**: Does there have to be proof that nodules are the same histologic type to be coded 1-4? Or can the assumption be made that they are of the same histologic type unless specified otherwise?

**A**: Per *note 2*, separate tumor nodules can be defined clinically by imaging, so not all separate tumor nodules need to be confirmed microscopically. Unless specified otherwise, you can assume they are all the same histologic type.

# Forum Q & A

**Q**:If a patient has a cT0 lung tumor, diagnosed due to mets from lung primary, how would separate tumor nodules be coded? A CT chest didn't identify any nodules.

**A**: Code to none (0) since the CT of chest didn't show any.

# Separate Tumor Nodules

| Sep Tumor Nodules | EOD Tumor | SS18 |
|---|---|---|
| **Code 1**:<br>Same histo (or assumed),<br>in same (ipsilat) lobe as primary | Code **500** | **2** |
| **Code 2**:<br>Same histo (or assumed),<br>in same (ipsilat) lung, different lobe | Code **700** | **7** |
| **Code 3**:<br>Same histo (or assumed),<br>in same (ipsilat) lung, same and different lobes | Code **700** | **7** |
| **Code 7**: | Do not code the info in EOD per *note 6* | Disregard info |

# Visceral & Parietal Pleural Invasion

- Chap 36 AJCC definition of pleural/elastic layer invasion (PL). Four categories.
- Invasion **beyond the elastic layer** or to the surface of the visceral pleura
- Elastic stain is not needed in most cases to assess pleural for invasion
- VPI (visceral pleural invasion) relevant for peripheral lung tumors
- Source document: Path report

# Visceral & Parietal Pleural Invasion

***Note 1***: Phys statement of visceral and parietal pleural invasion can be used to code this data item when no other info avail.

***Note 2***: Surgical resection must be done to code

***Note 3***: Do not use imaging findings to code

***Note 4***: Code 9 when:

- FNA only is performed. FNA not adequate to assess invasion
- Surgical resection of pri site performed and no mention of visceral and/or parietal pleural invasion.

# Visceral & Parietal Pleura Inv

| Code | Description |
|---|---|
| **0** | Stated PL0<br>No evidence of visceral pleural invasion (PL) ***Must be stated not present; cannot assume<br>Tumor does not completely traverse the elastic layer<br>Stated as PL0<br>Primary tumor is in situ, behavior /2.<br>No evid primary tumor |
| **4** | Stated PL1 or PL2<br>Invasion of visceral pleura present, NOS |
| **5** | Tumor invades into or through parietal pleural or chest wall<br>Stated PL3 |
| **6** | Tumor extends to pleura, NOS, not stated visceral or parietal |
| **8** | Not applicable |
| **9** | Not documented, no surgical resection, not assessed |

# ALK Rearrangement

- Performed for patients with advanced non-small cell lung cancer (NSCLC) to identify which tumors sensitive to small-molecule ALK kinase inhibitors
- Prognostic marker
- Factor in determining appropriate therapy
- Presence of ALK protein predicts favorable response to therapy with targeted ALK inhibitor such as Crizotinib or Ceritinib
- Source Document: Path report or molecular report
- ***Effective 2021+ dx***

# ALK Rearrangement

- ***Note 1***: This SSDI effective 2021+  Leave blank for 2018-2020
- ***Note 2***: Physician statement of ALK can be used
- ***Note 3***: ALK may be recorded for all histologies and stages; primarily performed for advanced NSCLC
- ***Note 4***: Most common ALK are
  - EML4-ALK
  - KIF5B-ALK
  - TFG-ALK
  - KLC1-ALK

# ALK Rearrangement

- ***Note 5***: If positive and no mention of specific ALK, **code 4**
- ***Note 6***: If neoadjuvant therapy given, record assay from tumor **prior to neoadjuvant therapy**
  - If neoadjuvant therapy given, no ALK from pre-treatment specimens, report from post-treatment specimens
- ***Note 7***: Code 9 when
  - Insufficient about of tissue to perform test
  - Test done and documented to be equivocal
  - No microscopic confirmation of tumor
  - ALK not ordered, not done or unknown if done

# ALK Rearrangement

| Code | Description |
|---|---|
| **0** | Normal<br>ALK Neg<br>Neg for rearrangement, no rearrangement identified, no mutations (somatic) identified, not detected |
| **1** | Abn rearrangement identified/detected: EML4-ALK; KIF5B-ALK, TFG-ALK, and/or KLC1-ALK |
| **2** | Rearrangement identified/detected: Other ALK not listed in code 1 |
| **4** | Rearrangement, NOS |
| **7** | Test ordered, results not in chart |
| **8** | Not applicable |
| **9** | Not documented in med rec. ALK rearrangement not assessed or unkn if assessed |
| **<blank>** | N/A Dx year is prior to 2021 |

# EGFR Mutational Analysis

- Performed on patients with advanced non-small cell lung cancer (NSCLC) to identify certain activating mutations in EGFR gene sensitive to **tyrosine kinase inhibitors**
  - Prognostic marker and factor in determining appropriate therapy
  - EXON 20 presence associated with resistance to EGFR drugs
- New for 2021 dx
- EGFR protein involved in cell signals that control cell division and survival. Mutations can cause high EGFR causing cancer cells to divide more rapidly.

# EGFR Mutational Analysis

- ***Note 1***: Effective for dx 2021+. Leave blank 2018-2020 dx.
- ***Note 2***: Physician statement of EGFR may be used
- ***Note 3***: EGFR recorded for all histologies and stages; however, primarily performed for advanced NSCLC. **If no info, code 9.**
- ***Note 4***: Most common EGFR:
  - Exon 18 Gly719
  - Exon 19 deletion
  - Exon 20 insertion
  - Exon 20 Thr790Met
  - Exon 21 Leu858Arg

# EGFR Mutational Analysis

- ***Note 5***: If EGFR positive and no mention mutated codon, or NOS, code 4
- ***Note 6***: If neoadjuvant therapy given, record assay from tumor specimens prior to neoadjuvant therapy.
  - If neoadjuvant therapy given, no EGFR results from pre-treatment specimens, report findings from post-treatment specimens
- ***Note 7***: Code 9 when
  - Insufficient amount of tissue available to perform test
  - No microscopic confirmation of tumor
  - EGFR not ordered or not done, unknown if ordered or done.

# EGFR Mutational Analysis

| Code | Description |
|---|---|
| **0** | Normal<br>EGFR negative, EGFR wild type<br>Neg for mutations, no alterations, no mutations (somatic) identified, not detected |
| **1** | Abnormal (mutated)/detected in exon(s) 18, 19, 20 and/or 21 |
| **2** | Abnormal (mutated)/detected but not in exon(s) 18, 19, 20, and/or 21 |
| **4** | Abnormal (mutated)/detected, NOS, exon(s) not specified |
| **7** | Test ordered, results not in chart |
| **8** | Not applicable |
| **9** | Not documented in med record. EGFR not assessed or unknown if assessed |
| **<blank>** | N/A – Diagnosis year is prior to 2021 |

# Grade v3.1

Lung

# Lung Grade Table 02

| Description | Code |
|---|---|
| G1: Well differentiated | **1** |
| G2: Moderately differentiated | **2** |
| G3: Poorly differentiated | **3** |
| G4: Undifferentiated; Anaplastic | **4** |
| Grade can’t be assessed; Unknown | **9** |

- Grade Clinical
- Grade Pathological
- Grade Post Therapy Clin (yc)
- Grade Post Therapy Path (yp)

# Clinical & Path Grade Coding Timeframe

**Grade Pathological:** Diagnosis through 1st course surgery without neoadjuvant Tx

Autopsy – Clinical

Autopsy – Path



**Grade Clinical:** Diagnosis – biopsy, FNA, imaging, etc.

First course surgery

Adjuvant Therapy

# Post-Therapy Grade Coding Timeframe

Autopsy – Clinical

**Grade Clinical**: Diagnosis – biopsy, FNA, imaging, etc.

Neoadjuvant Therapy

Autopsy – Post Therapy Clin



Grade Post-therapy Clin

Autopsy – Post Therapy Path

Grade Post-therapy Path

# Forum Q&A:

**Q**: Lung biopsy of the **LUL** shows a **high-grade spindle cell histology malignant neoplasm**. The patient goes onto have a resection/lobectomy and has an **anaplastic pleomorphic spindle cell giant cell arising from mod diff adenocarcinoma** - acinar, lepidic, micropapillary patterns. No further information than what is listed above from the pathology reports. Treating this as a lung case which does not offer high grade under the clinical grade section. Please advise below.

1) What is the clinical grade?

2) What is the pathologic grade?

| Code | Grade Description |
|---|---|
| 1 | G1: Well differentiated |
| 2 | G2: Moderately differentiated |
| 3 | G3: Poorly differentiated |
| 4 | G4: Undifferentiated anaplastic |
| 9 | Grade cannot be assessed (GX); Unknown |

# FORUM answer

**A**: Clinical grade would be 9. "High" grade is not terminology collected for Lung.

Pathological grade would be 4. Per the note 3 in the Lung grade, "Anaplastic" is coded as G4. The pleomorphic (with the anaplastic grade) tumor is arising from the adenocarcinoma tumor (which is mod diff); however, you would still take the higher grade from the pleomorphic spindle cell.

1) What is the clinical grade? **9**

2) What is the pathologic grade? **4**

# Small Cell Lung Cancer

- https://cancerbulletin.facs.org/forums/forum/site-specific-data-items-grade-2018/124735-small-cell-carcinoma-grade
- Small Cell Carcinoma is, by definition, anaplastic per the SSDI Working Group
- If the **biopsy** path report states Small Cell Carcinoma with no grade for a lung mass biopsy, record the **clinical grade as 4** according to the above post.
- If a lobectomy is performed and the path report states Small Cell Carcinoma, G3,
- Do we record a pathological grade 4 due to the clinical grade being higher?

# Small Cell Lung Cancer

- If the biopsy path report states Small Cell Carcinoma with no grade for a lung mass biopsy, do we record the clinical grade as 4 according to the above post.
  - **Answer**: If a biopsy is done, diagnosis small cell carcinoma of the lung, Grade is 4 (this is because Lung has a 4-grade system)

- If a lobectomy is performed and the path report states Small Cell Carcinoma, *G3, PD*, do we record a pathological grade 4 due to the clinical grade being higher?
  - **Answer**: If a lobectomy is performed and the path report states Small Cell Carcinoma, Grade is 4 because small cell carcinoma is always the highest grade, and lung is a 4-grade system.

# Case Scenarios

# Case Scenario 1

12/18/2024 RUL bx: adenocarcinoma

1/6/2025 PET: 2 hypermetabolic malig nodules in RUL, 1.3cm and 1cm; 1.9cm groundglass opacity in RUL, doesn't demonstrate significant activity; no lymph nodes or distant mets

Oncologist: synchronous T1 N0 M0 adenocarcinoma RUL

**What is the correct EOD Primary Tumor?**

**What is the SSDI – Separate Tumor Nodules?**

# Case Scenario 2

LLL biopsy: Adenocarcinoma

EGFR: low coverage region

- Low coverage regions are included when mean coverage over region(s) of a gene falls below a threshold of 1000x. The absence of alterations in genes with low coverage should be interpreted carefully in the context of the patient's diagnosis with consideration for retesting. Variants are identified through aligning the patient's DNA sequence to the human genome reference sequence version hg19(GRCh37).

How would you code EGFR?

# Case Scenario 3

Right VATS Superior Segmentectomy, RLL: Adenocarcinoma, MD, 1cm

Tumor extension: limited to lung parenchyma

Tumor comes to within 0.1cm from the pleura

EOD Primary Tumor:

SSDI – Visceral & Parietal Pleura:

# Case Scenario 4

RUL, wedge resection: 1cm squamous cell carcinoma, pd (pT1a)

RLL,  wedge resection: 1.5cm squamous cell carcinoma, md (pT1b)

Single primary – M7

EOD Primary Tumor:

SSDI – Separate Tumor Nodule:

# Questions?
# Thank You

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