

# Pancreatic Endocrine Tumors

Note: Use pancreatic carcinoma template for neuroendocrine carcinomas

## Procedure

Excisional biopsy (enucleation)  
 Pancreaticoduodenectomy (Whipple resection)  
 Total pancreatectomy  
 Distal pancreatectomy  
 Segmental pancreatectomy  
 Other (specify): \_\_\_\_\_  
 Not specified

## Tumor Site:

Head  
 Uncinate process  
 Body  
 Tail  
 Cannot be determined

**Tumor Size:** \_\_\_\_\_ cm

Specify largest tumor size if multiple

## Tumor Focality:

Unifocal  
 Multifocal (specify number): \_\_\_\_\_  
 Cannot be determined

## Histologic Type and Grade:

G1: Well-differentiated neuroendocrine tumor  
 G2: Well-differentiated neuroendocrine tumor  
 G3: Well-differentiated neuroendocrine tumor  
 GX: Well-differentiated neuroendocrine tumor, grade cannot be assessed

<b>Grade</b>	<b>Mitotic rate (/10 HPF)</b>	<b>Ki67 index (%)</b>
G1	<2	<3
G2	2-20	3-20
G3	>20	>20

## Mitotic Rate:

<2 mitoses per 2 mm<sup>2</sup>  
 2-20 mitoses per 2 mm<sup>2</sup>  
 >20 mitoses per 2 mm<sup>2</sup>  
 Cannot be determined (explain): \_\_\_\_\_

*Note: 10 HPF is defined as a 2 mm<sup>2</sup> area. AJCC recommends counting 10mm<sup>2</sup> and dividing by 5. The area will vary based on your eyepiece field number. If your field*

number is "22" (written on your eyepiece), using a 40x objective, **42 HPF = 10mm<sup>2</sup>** & **8.4 HPF = 2mm<sup>2</sup>**

**Ki-67 Labeling Index:**

*AJCC recommends counting 500 to 2000 cells in area of highest labeling*

- <3% in area of highest labeling
- 3-20% in area of highest labeling
- >20% in area of highest labeling
- Cannot be determined (explain): \_\_\_\_\_

**Tumor Extension** (select all that apply)

- Confined to the pancreas
- Invades the common bile duct
- Invades the duodenum
- Invades adjacent organs\* (specify): \_\_\_\_\_
- Invades the wall of large vessels\*\* (specify): \_\_\_\_\_
- Cannot be assessed

*\*Adjacent organs include stomach, spleen, colon, and adrenal gland*

*\*\*Large vessels include celiac axis and superior mesenteric artery*

**Margins:**

- Negative (all margins including proximal pancreatic parenchymal margin uninvolved by tumor)
- Negative (all margins including proximal and distal pancreatic parenchymal margins uninvolved by tumor)
- Negative (all margins including pancreatic neck, retroperitoneal, and bile duct margins uninvolved by tumor)
- Involved by tumor (specify margins):
- Cannot be assessed

**Lymphovascular Invasion:**

- Present
- Not identified
- Cannot be determined

**Perineural Invasion:**

- Present
- Not identified
- Cannot be determined

**Regional Lymph Nodes:**

- No lymph nodes submitted or found
- Number of nodes involved / total examined: \_\_\_ / \_\_\_

**Distant metastases:**

- Yes (specify site)
- Unknown

**Pathologic Stage Classification (AJCC 8<sup>th</sup> Edition):**

TNM Descriptors (required only if applicable)

\_\_\_ m (multiple primary tumors)

\_\_\_ r (recurrent)

\_\_\_ y (posttreatment)

**T Stage****T1** Tumor limited to the pancreas\*, < 2 cm in greatest dimension\*\***T2** Tumor limited to the pancreas, 2-4 cm in greatest dimension**T3** Tumor limited to the pancreas, >4 cm in greatest dimension; or tumor invading duodenum or common bile duct**T4** Tumor invading adjacent organs (stomach, spleen, colon, adrenal gland) or the wall of large vessels (celiac axis or the superior mesenteric artery)

*\*Extension of tumor into peripancreatic adipose tissue is considered as confined to the pancreas. "Limited to the pancreas" means there is no invasion of adjacent organs or the wall of large vessels.*

*Note: For **multiple tumors**, the largest tumor should be used to assign T category.*

- If the number of tumors is known, use T(#); example: pT3(4) N0 M0.*
- If the number of tumors is unavailable or too numerous, use the m suffix, T(m); example: pT3(m) N0 M0.*

**N Stage****N0** No regional lymph node involvement**N1** Regional lymph node involvement**M Stage** (required only if confirmed pathologically in this case)

*If not M1, then do not include an M stage (do not use Mx).*

M1 Distant metastasis

**M1a:** Metastasis confined to liver**M1b:** Metastasis in  $\geq 1$  extrahepatic site (e.g. lung, ovary, nonregional lymph node, peritoneum, bone)**M1c:** Both liver and extrahepatic metastases