Malignant neoplasms

Lymphoid, haematopoietic and related tissues
These malignancies are systemic with the malignant cells circulating through the lymphatic or haematopoietic systems. They do not metastasise in the same way as solid tumours. See ACS 0222 Lymphoma and ACS 0245 Remission in malignant immunoproliferative diseases and leukaemia for further information.

Histology and behaviour
Histological type is usually determined via microscopic examination of a bone marrow or lymph node specimen. Flow cytometry, chromosomal analysis, cytogenetics and molecular studies provide further diagnostic information (Bradstock 2008).

Solid neoplasms
Coding solid malignant neoplasms involves abstracting information about the anatomical site(s) of the tumour(s) and the histological type(s).

Primary site
The site where cancer originates is known as the primary site. A neoplasm is always described in terms of the primary site, even if it has spread (metastasised) to another part of the body. For example, colon cancer that has metastasised to the liver is always described as colon cancer (not liver cancer) even if the colon tumour has been surgically excised.

Secondary site
When cancer cells spread to other parts of the body and form secondary deposits/tumours, these are referred to as secondary sites, or metastases. Spread can occur through the lymphatic system and the bloodstream. Initial metastatic spread is usually to the regional (nearby) lymph nodes, and subsequently to other organs.

Hints
- Metastases should not be confused with invasion of adjacent organ by the primary tumour. For example, prostate adenocarcinoma invading bladder neck is local invasion and not a metastasis to the bladder. Only the primary site (prostate) is coded.
- See ACS 0239 Metastases for further information and guidelines about interpreting documentation of metastases.
**Histology and behaviour**
A solid tumour’s histological type and behaviour is determined by a histopathologist via microscopic examination of a tissue specimen, and detailed in the histopathology report. The specimen may be from the primary or secondary site. Coders should abstract the histological type and behaviour from the conclusion of the histopathology report only, and not interpret findings in the body of the report. This information may be used to assign site(s) codes and morphology code(s). See ACS 0233 *Morphology* for further information.

**Hints**

- Histopathology specimens provide a more specific diagnosis than cytology specimens, and if both are available, code only the information from the histopathology result.

- Some diagnostic terminology that may be used in describing neoplasms:

<table>
<thead>
<tr>
<th>Terms likely to indicate malignancy</th>
<th>Uncertain terms - further information required before coding malignancy</th>
</tr>
</thead>
<tbody>
<tr>
<td>apparent(ly)</td>
<td>cannot be ruled out</td>
</tr>
<tr>
<td>appears to</td>
<td>equivocal</td>
</tr>
<tr>
<td>compatible with</td>
<td>possible</td>
</tr>
<tr>
<td>consistent with</td>
<td>potentially malignant</td>
</tr>
<tr>
<td>favour(s) / favouring</td>
<td>questionable</td>
</tr>
<tr>
<td>malignant appearing</td>
<td>rule out</td>
</tr>
<tr>
<td>most likely</td>
<td>suggests/suggestive</td>
</tr>
<tr>
<td>presumed</td>
<td>worrisome</td>
</tr>
<tr>
<td>probable</td>
<td></td>
</tr>
<tr>
<td>suspected</td>
<td></td>
</tr>
<tr>
<td>suspicious (for)</td>
<td></td>
</tr>
<tr>
<td>typical of</td>
<td></td>
</tr>
</tbody>
</table>

(SEER Training Modules 2012)

**Current cancer VS personal history of cancer**
If cancer meets criteria for coding, follow the instructions in ACS 0236 *Neoplasm coding and sequencing* to determine whether cancer should be coded as a current condition. If the criteria in ACS 0236 are not met, the cancer should instead be coded as personal history. ACS 2112 *Personal history* advises only to assign a history code when it is directly relevant to the current episode.
Sequencing neoplasm codes

ACS 0236 *Neoplasm coding and sequencing* directs that sequencing of primary and secondary sites for metastatic cancer cases is dependent on the treatment at each episode. Therefore it may be appropriate to sequence the secondary code(s) before the primary code(s) in some episodes.

Example: Patient admitted for drainage of malignant ascites (metastatic from ovarian carcinoma). The metastasis is the reason for admission and is sequenced as principal diagnosis:

C78.6 Secondary neoplasm of peritoneum and retroperitoneum
M8010/6 Carcinoma, metastatic NOS
C56 Primary malignant neoplasm of ovary
M8010/3 Carcinoma NOS

Principal diagnosis selection should be in accordance with ACS 0001 *Principal diagnosis*, except for same-day chemotherapy or same-day radiotherapy where the following standards should be followed:

ACS 0044 Chemotherapy
ACS 0229 Radiotherapy

Recurrence

The term ‘recurrence’ refers to malignancy returning after it has been previously eradicated. The recurrence may occur in the same site as the original primary, and/or as a metastasis. Regardless of where the recurrence occurs, assign a code for the original primary site. Code also any other metastatic sites.

See ACS 0237 *Recurrence of primary malignancy* for further information.

Unknown primary

In some situations it cannot be determined where a cancer originated. For example, metastases are discovered but further investigations reveal no primary site; or a decision is made not to perform investigations. For these cases assign the appropriate code from C80 *Malignant neoplasm without specification of site* as the primary site code.
Overlapping sites

'Overlapping' implies that the sites involved are contiguous (next to each other). A neoplasm that overlaps contiguous sites and whose point of origin cannot be determined should be classified to the subcategory .8 ('overlapping lesion'), unless the combination is specifically indexed elsewhere.

See examples below, and also refer to ACS 0234 Contiguous sites for further information.

Example 1: Overlapping tongue primary
Carcinoma of the tip and ventral surface of the tongue. It is not known which of the sites the tumour originated: tongue tip (C02.1) or ventral surface (C02.2).
Assign:
C02.8 Overlapping lesion of tongue
M8010/3 Carcinoma NOS

Example 2: Tip of tongue primary extending to contiguous site
Carcinoma of the tip of the tongue extending to involve the ventral surface. The point of origin (tip of tongue) is known, assign:
C02.1 Border of tongue
M8010/3 Carcinoma NOS

Example 3: Overlapping breast primary
Ductal carcinoma 3 o'clock left breast. It is not known which of the sites the tumour originated: upper outer quadrant (C50.4) or lower outer quadrant (C50.5). Assign:
C50.8 Overlapping malignant lesion of breast
M8500/3 Infiltrating duct carcinoma NOS
**Multiple tumours**

Occasionally multiple primaries occur with separate tumours in the same organ or in different organs. The separate tumours may have the same or different morphology. When there are multiple tumours, the documentation should be carefully checked to determine whether the tumours are considered to be multiple separate primaries, or a primary tumour with metastatic spread. The clinical coder should be guided by the clinical documentation and query with the clinician if unsure. The terms multi-focal or multi-centric may be used to describe multiple tumours, particularly of the breast.

A separate site code for each primary site should be assigned as per the following examples:

**Example 1: Multiple primaries of breast**

Left breast tumour at 11 o’clock and two tumours at 2 o’clock. Histology showed all cancers were invasive ductal carcinomas and all were ER and PR positive, HER2 negative. 1/14 lymph nodes contained tumour.

- **C50.2** Malignant neoplasm of upper-inner quadrant of breast
- **C50.4** Malignant neoplasm of upper-outer quadrant of breast
- **M8500/3** Infiltrating duct carcinoma NOS
- **C77.3** Secondary and unspecified malignant neoplasm of axillary and upper limb lymph nodes
- **M8500/6** Infiltrating duct carcinoma NOS, metastatic

**Example 2: Multiple primaries of lung**

Two poorly differentiated nodules in the left lung (one in upper lobe and one in lower lobe), as well as contralateral scalene lymphadenopathy. Biopsy of scalene node showed adenocarcinoma.

- **C34.1** Malignant neoplasm of upper lobe, bronchus or lung
- **C34.3** Malignant neoplasm of lower lobe, bronchus or lung
- **M8140/3** Adenocarcinoma NOS
- **C77.0** Secondary and unspecified malignant neoplasm of lymph nodes of head, face and neck
- **M8140/6** Adenocarcinoma, metastatic NOS

**Example 3: Multiple primaries of bladder**

TURBT lesion bladder wall and lesion LUO. Histology showed TCC.

- **C67.9** Malignant neoplasm of bladder, unspecified
- **C67.6** Malignant neoplasm of ureteric orifice
- **M8120/3** Transitional cell carcinoma NOS
Multiple tumours (continued)

Example 4: Lung primary with metastases in lung
Infiltrating spiculated mass measuring 30mm in right apex, with multiple nodules throughout right upper and middle lobes consistent with intrapulmonary metastases, and extensive mediastinal lymphadenopathy.
C34.1  Malignant neoplasm of upper lobe, bronchus or lung
M8000/3  Neoplasm malignant
C77.1  Secondary and unspecified malignant neoplasm of intrathoracic lymph nodes
C78.0  Secondary malignant neoplasm of lung
M8000/6  Neoplasm, metastatic

Example 5: Colon primary with metastasis in liver
Ascending colon adenocarcinoma with 3/10 positive regional lymph nodes. CT showed solitary liver lesion, confirmed as metastasis on PET scan.
C18.2  Malignant neoplasm of ascending colon
M8140/3  Adenocarcinoma NOS
C77.2  Secondary and unspecified malignant neoplasm of intra-abdominal lymph nodes
C78.7  Secondary malignant neoplasm of liver and intrahepatic bile duct
M8140/6  Adenocarcinoma, metastatic NOS
Wider excision of skin cancer

If histopathology shows inadequate margins, the patient may be re-admitted for wider excision to ensure any remaining cancer is removed. If no residual malignancy is found in the subsequent sample, the original primary malignancy should still be coded as a current condition, as per ACS 0236 Neoplasm coding and sequencing.

Multiple skin lesions

Patients may have multiple skin lesions removed during the same visit to theatre. This can present a problem for coders due to the limitation of only being able to use each ICD-10-AM diagnosis code ONCE per episode.

Example

Neck x1 lesion (C44.4): basal cell carcinoma
Ear x2 lesions (C44.6): 1x squamous cell carcinoma and 1x basal cell carcinoma

Codes:
C44.4 Malignant neoplasm of skin of scalp and neck
M8090/3 Basal cell carcinoma NOS
C44.2 Malignant neoplasm of skin of ear and external auricular canal
M8070/3 Squamous cell carcinoma NOS
C44.2 Malignant neoplasm of skin of ear and external auricular canal
M8090/3 Basal cell carcinoma NOS

We are unable to use the same diagnosis code more than once per episode – hence in the above example C44.2 and M8090/3 cannot be assigned twice. We are forced to omit codes but try to capture as many elements as possible. In order to capture the two different sites and morphologies, we omit the codes for BCC of the ear:
C44.4 Malignant neoplasm of skin of scalp and neck
M8090/3 Basal cell carcinoma NOS
C44.2 Malignant neoplasm of skin of ear and external auricular canal
M8070/3 Squamous cell carcinoma NOS
C44.2 Malignant neoplasm of skin of ear and external auricular canal OMIT
M8090/3 Basal cell carcinoma NOS OMIT

The final code assignment captures as many elements as possible (two sites and two morphologies):
C44.4 Malignant neoplasm of skin of scalp and neck
M8090/3 Basal cell carcinoma NOS
C44.2 Malignant neoplasm of skin of ear and external auricular canal
M8070/3 Squamous cell carcinoma NOS

We are able to reflect the exact number of separate lesions excised when coding the procedures. As per ACS 0020 Multiple/bilateral procedures, assign:
31235-01 [1620] Excision of lesion(s) of skin and subcutaneous tissue of neck
31230-02 [1620] Excision of lesion(s) of skin and subcutaneous tissue of ear
31230-02 [1620] Excision of lesion(s) of skin and subcutaneous tissue of ear
Palliative care

ACS 0224 Palliative care should only be followed for episodes where the clinician has designated the care type ‘Palliative Care’.

Acute Care type patients who during their care become palliative need to be statistically discharged and readmitted as Palliative Care type. The second episode (Palliative Care) is then coded in accordance with ACS 0224 Palliative care.

Reconstruction of breast following mastectomy

Reconstruction of the breast may be performed at the same time as mastectomy or in a subsequent admission.

Coding Matters, March 2002 (volume 8 number 4) provides guidance for episodes specifically for post-mastectomy breast reconstruction, advising that Z42.1 Follow-up care involving plastic surgery to breast should be assigned followed by a code for either breast cancer, or personal history of breast cancer (the coder must follow ACS 0236 Neoplasm coding and sequencing to determine whether breast cancer should be coded as a current condition).

Incidental diagnosis of malignancy

Coding Matters 2009 (volume 16 number 3) instructs that incidental findings on pathology reports should not be routinely coded, as per these examples:

- A patient is admitted with chronic ongoing pelvic pain for abdominal hysterectomy. Pathology results show CIN III, would you code CIN III as an additional diagnosis?

  Clinical advice confirms that CIN III in the scenario cited is an unexpected finding: 'CIN III usually does not produce any symptoms at all, and certainly not pelvic pain. It results in an abnormal smear test, which then requires assessment by colposcopy and biopsy. It is usually treated by laser or cone biopsy, rarely by hysterectomy. In this instance it was likely to be an unexpected finding on histologic examination of the excised uterus, where the uterus was removed for pain not the CIN III.' Therefore, in the scenario cited CIN III should not be coded as per the guidelines in ACS 0010 General abstraction guidelines.

- A patient is admitted with breast hypertrophy for reduction mammoplasty. After discharge pathology of the breast reveals ductal carcinoma in situ (DCIS). Would you code the DCIS?

  In the scenario cited the finding of DCIS on pathology is an unexpected finding and should not be coded, as per the guidelines in ACS 0010 General abstraction guidelines. The above scenarios have also highlighted an issue where coders may consider it necessary to assign a cancer code to generate a cancer notification for the cancer registry. Coders should be aware that the pathology department will do this automatically, irrespective of whether the condition is coded in the inpatient episode of care.
**Prophylactic organ removal**

When a patient is admitted for prophylactic surgery, follow ACS 2114 *Prophylactic surgery* which instructs that an appropriate code from Z40 *Prophylactic surgery* can be assigned as principal diagnosis, and the risk factor necessitating prophylactic surgery as additional diagnosis.

**Example 1**

Patient admitted for mastectomy for ductal carcinoma of left breast, and prophylactic mastectomy of right breast.

Diagnosis code assignment:

- C50.9  *Malignant neoplasm of breast, unspecified part*
- M8500/3  *Infiltrating duct carcinoma NOS*
- Z40.00  *Prophylactic surgery for risk-factors related to malignant neoplasm, breast*

As per ACS 0001 *Principal diagnosis*, the reason chiefly responsible for occasioning this episode is breast cancer which is sequenced as principal diagnosis.

**Example 2**

Consider again example 1, however the planned prophylactic right mastectomy is not performed at the same time as the left mastectomy. Instead it is scheduled for 6 weeks later (staged surgery).

Diagnosis code assignment:

- Z40.00  *Prophylactic surgery for risk-factors related to malignant neoplasm, breast*
- C50.9  *Malignant neoplasm of breast, unspecified part*
- M8500/3  *Infiltrating duct carcinoma NOS*

As per ACS 0001 *Principal diagnosis*, the reason chiefly responsible for occasioning this episode is prophylactic surgery, therefore Z40.00 is sequenced as principal diagnosis. We then refer to ACS 0236 *Neoplasm coding and sequencing* to determine whether the cancer should be coded as a current condition. As per ACS 0236, because the episode is for staged prophylactic surgery, the cancer is coded as a current condition irrespective of whether it is considered ‘cured’ or is receiving current treatment.
Prophylactic organ removal (continued)

Example 3
Patient previously underwent a left mastectomy for breast cancer, followed by chemotherapy. Follow-up investigations confirmed the cancer was cured and no further treatment was required. Due to patient’s anxiety regarding possible cancer recurrence, the patient decides to have a prophylactic right mastectomy.

Diagnosis code assignment:
- Z40.00  Prophylactic surgery for risk-factors related to malignant neoplasm, breast
- Z85.3  Personal history of malignant neoplasm of breast

Prophylactic surgery was not part of the initial treatment plan and is therefore not considered staged, so the ‘staged prophylactic surgery’ criteria in ACS 0236 do not apply in this instance and cancer is not automatically coded as a current condition. None of the other criteria in ACS 0236 are met either - the cancer has been cured and is not receiving any current management so it is coded as personal history.

Example 4
Treatment plan decided for newly diagnosed breast cancer patient: mastectomy followed by prophylactic oopherectomy 6 months later. Patient admitted for prophylactic bilateral oopherectomy.

Diagnosis code assignment:
- Z40.01  Prophylactic surgery for risk-factors related to malignant neoplasm, ovary
- C50.9  Malignant neoplasm of breast, unspecified part
- M8000/3  Neoplasm, unspecified

As per ACS 0001 Principal diagnosis, the reason chiefly responsible for occasioning this episode is prophylactic surgery, therefore Z40.01 is sequenced as principal diagnosis. We then refer to ACS 0236 Neoplasm coding and sequencing to determine whether the cancer should be coded as a current condition. As per ACS 0236, because the episode is for staged prophylactic surgery, the cancer is coded as a current condition irrespective of whether it is considered ‘cured’ or is receiving current treatment.

Hints
- There is no ICD-10-AM code for gene mutation. If this is the only risk factor for which prophylactic surgery is being performed, code the appropriate code from Z40 Prophylactic surgery alone.
- When selecting the appropriate code from Z40 Prophylactic surgery, select the code that corresponds with the healthy organ being removed this episode (see example 4 above).
- Patient admitted for post-mastectomy breast reconstruction plus prophylactic mastectomy of remaining breast: Follow ACS 0001 Principal diagnosis to determine whether Z40 Prophylactic surgery or Z42.1 Follow-up care involving plastic surgery of breast should be sequenced as principal diagnosis.
National coding decisions

Coding Q&A - NCCC

- Principal diagnosis for insertion of fiducial markers: Coding Q&A April 2011
- Recurrence of TCC of the bladder: Coding Q&A December 2011
- Morphology of recurrent mediastinal tumour: Coding Q&A December 2011
- Same-day admission for both radiotherapy and chemotherapy: Coding Q&A December 2011
- Paravertebral or paraspinal neuroblastom: Coding Q&A December 2012
- Unknown primary with neoplasm site default in Alphabetic Index: Coding Q&A Dec 2012
- Principal diagnosis for prophylactic PEG insertion prior to oropharyngeal radiation therapy: Coding Q&A December 2012
- CIN III as principal diagnosis and indication for LLETZ procedure: Coding Q&A Dec 2012
- Follicular non-Hodgkin lymphoma: Coding Q&A December 2012
- Intramucosal adenocarcinoma/carcinoma of colon: Coding Q&A December 2012
- Insertion of fiducial marker into the lung percutaneously: Coding Q&A June 2013

Coding Matters - NCCH

- Breast reconstruction: Coding Matters 2002 volume 8 number 4
- Spinal cord compression secondary to neoplasm: Coding Matters 2004 volume 11 number 2
- Morphology codes for the abbreviated term ‘Ca’: Coding Matters 2005 volume 12 number 3
- Conjunctival Intraepithelial Neoplasia: Coding Matters 2007 volume 14 number 3
- Pharmacotherapy
- Coding of findings on pathology reports: Coding Matters 2009 volume 16 number 3
- Family history of HNPCC: Coding Matters 2009 volume 16 number 3
- Brachytherapy planning: Coding Matters 2010 volume 16 number 4
WA coding decisions

- Adenocarcinoma, intramucosal
- Biopsy, frozen section, during surgery
- Blastic Plasmacytoid Dendritic Cell Tumour of Skin/Soft Tissue of Chin
- Booked Admission for Excision of Lesion That has Disappeared
- Familial adenomatous polyposis (FAP)
- Febrile Neutropenia Secondary to Chemotherapy
- Follicular Lymphoma transformed to Diffuse Large B-Cell Lymphoma
- Gold bead markers, perianal
- Harvesting of ova pre-chemotherapy
- Infusion, Killer T-cells
- Morphology coding
- Multiple primary tumours in the same organ
- Papillary TCC of kidney
- Post Moh's defect reconstruction
- Shaving of skin lesion


References
