CD Part 13

Cancer

A. Definitions

The following definitions are for words used in this chapter and during the SSA disability process. If you need additional definitions, consult a good medical dictionary, available in most bookstores and libraries. You can also look at online medical dictionaries like the one at www.medlineplus.gov.

Allogeneic transplant. Transplant from an unrelated donor or from a related donor who is not an identical twin.

Angiography. Any technique to produce images of arteries, such as by x-rays or MRI scans. Usually involves injection of contrast material into the artery to make it visible. Also known as *arteriography.*

Angiosarcoma. A cancerous connective tissue tumor that could be either of blood vessels (*hemangiosarcoma*) or lymphatic vessels (*lymphangiosarcoma*).

Antineoplastic drugs. Drugs used to treat cancer.

Ascites. Abnormal accumulation of fluid in the abdomen. A frequent cause of ascites is liver failure associated with alcoholism. However, cancer can also be a cause, especially cancer of the ovaries.

Astrocytoma. Malignant brain tumors arising from the astrocyte cells of the brain. May be of varying degrees of malignancy.

Autologous transplant. Transplant from one's own cells or from an identical twin.

Axilla. Armpit.

Benign. Noncancerous.

Biopsy. The process of taking a sample of tissue for detailed analysis of various kinds. Biopsy specimens are observed grossly with the eyes, microscopically with a variety of possible tissue stains, and in some cases may involve specific chemical and DNA analysis.

Bowel. Intestine.

Bronchoscopy. Direct visualization of the bronchial tubes that carry air to and from the lungs. Used to take tissue samples (biopsy) of abnormalities, such as tumor and infections, for diagnostic purposes.

Cancer. A multiplication of abnormal cells, the natural course of which is fatal if untreated. The two important characteristics of cancer are that, unlike normal tissues, cancerous cells may be invasive to surrounding structures and may also spread to other locations in the body (metastasize). Also known as *malignancy.*

Carcinoembryonic antigen (CEA). Substance measured by a blood test as a possible marker for recurrence of various types of cancer, such as for recurrence of lung cancer, breast cancer, and colon cancer. However, it is not diagnostic for the recurrence of cancer.

Carcinogenic. Anything that promotes the development of cancer.

Carcinomas. Cancers of epithelial tissues, such as the skin, mucous membranes in the mouth and nose, cells lining the bronchi of the lungs, and glandular tissue in the breasts or lining the inside of the large intestine. When glandular tissue is involved, the cancer is some type of adenocarcinoma. Colon cancer is often an adenocarcinoma.

Chemotherapy. Treatment of a medical disorder with drugs. Adjuvant chemotherapy is drug treatment given just after a local treatment, such as surgical removal of a tumor. Primary chemotherapy means drugs are given before a local treatment or instead of a local treatment.

Colectomy. Removal of a part of the colon. A total colectomy means removal of the entire colon.

Colon. The large intestine.

Colostomy. Surgically placed opening from the colon through the abdominal wall to the outside of the body.

Complete remission. Absence of any objective evidence of cancer.

Computerized axial tomography (CAT Scan, CT Scan) of abdomen. Multiple x-ray "slices" of abdominal structures that are analyzed by a computer and made into detailed images.

Cryotherapy. Treatment by application of cold, such as freezing a tumor.

Cystectomy. Removal of the bladder.

Epidermoid carcinoma. See *squamous cell carcinoma.*

Erythema. Redness of the skin caused by increased blood flow in the small capillary blood vessels. Erythema often accompanies inflammation, because inflammation is associated with the release of substances that dilate blood vessels and increase blood flow.

Excision. See *resection.*

Extension (of tumor). Invasion of nearby tissues by direct tumor growth; should not be confused with metastasis.

Fibroma. Any benign tumor of fibrous connective tissue.

Fibrosarcoma. A cancerous tumor of fibrous connective tissue.

Frozen section. A thin slice of frozen tissue given by a surgeon to a pathologist for microscopic examination during surgery. If cancer is present, the frozen section diagnosis permits the surgical procedure to be adjusted accordingly, such as widening the area of tissue to be removed.

Hemangioma. A benign tumor made up of blood vessels.

Hemangiosarcoma. A rare and highly malignant connective tissue tumor of blood vessels.

Hilar lymph nodes. Nodes situated in the hilum of each lung, a location where arteries, veins, and lymphatic vessels enter the right or left lung.

Hormone-dependent tumors. Tumors that are stimulated in their growth by certain hormones. For example, prostate cancer is stimulated by the male sex hormone testosterone and some breast cancers have receptors for the female sex hormones estrogen and progesterone. These female sex hormones stimulate the cancers that have receptors for them.

Hysterectomy. Removal of the uterus.

Induration. Abnormal hardening of tissue.

In situ. The earliest stage of a cancer, in which it is still confined to its cell layer of origin. Even if not mentioned by a listing, in situ cancers are excluded from all listings.

Laryngectomy. Removal of the larynx.

Larynx. Structure of hard cartilage that holds the vocal cords; voice box.

Leiomyoma. A benign tumor of smooth muscle. Smooth muscle is muscle not under voluntary control, such as in the intestines and the uterus, which are the locations in which most leiomyomas are found. Leiomyomas of the uterus are popularly known as uterine fibroids.

Leiomyosarcoma. A malignant tumor of smooth (involuntary) muscle, such as cancers arising from the muscles of the uterus or intestines.

Leukemia. Any of the of white blood cell cancers arising in the bone marrow or lymph nodes. Specific leukemias are named according to which type of white cell is involved, such as lymphocytic leukemia and myelocytic leukemia. Leukemia is also classified as acute or chronic. Acute leukemias are those with the most cancerous cells, while chronic leukemias have more normal cells.

Lipoma. A common, benign tumor of fatty (adipose) tissue.

Liposarcoma. A cancerous tumor arising from fatty tissue.

Lobectomy. Removal of a lobe of a lung.

Low-grade malignancy. Reference to relatively slowly growing and less aggressive cancer.

Lymphangiography. X-rays of the lymphatic system following the injection of x-ray contrast material.

Lymphangioma. A benign tumor made up of lymphatic vessels that can occur almost anywhere in the body.

Lymphangiosarcoma. A highly cancerous and rare connective tissue tumor of lymphatic vessels.

Lymph nodes. Specialized collections of cells found in various locations along the system of lymph vessels. Lymph nodes function for the immune system and contain lymphocytes. For example, lymph nodes can trap and destroy bacteria. Lymph nodes also may contain cancerous cells that are being spread through the lymphatic system. Therefore, biopsy of lymph nodes is important in determining whether cancer has metastasized from the original tumor.

Lymphomas. Cancers of the lymph nodes and spleen that result in abnormal lymphocytes. Lymphoma can invade any organ of the body. Hodgkin's and non-Hodgkin's lymphoma are two important classifications.

Lymphoproliferative disorders. See *lymphomas.*

Lymphoscintigraphy. Method of visualizing lymph nodes by injection of a radioactive substance and making images of lymph nodes that concentrate the radioactivity. Lymphoscintigraphy is used for detecting spread of cancer to lymph nodes.

Magnetic resonance imaging (MRI). Method of producing pictures of internal body structures using magnetic fields and radiofrequency fields. MRIs do not utilize x-rays or other radiation.

Malignant. Cancerous.

Malignant melanoma. A highly cancerous and dangerous skin tumor that can spread through the body. Once spread to other organs occurs, the prognosis is grave. The risk of melanoma increases with exposure to sunlight.

Mandible. Lower jaw bone.

Maxilla. Upper jaw bone.

Mean survival. The mean survival regarding cancer is the average survival time.

Median survival. In regard to cancer or other disease, that amount of time in which half the patients live longer and half the patients live shorter times. It is a statistical method of description, at which the survival probability curve is divided in half.

Mediastinum. The space between the two lungs containing the heart, bronchi, esophagus, trachea, lymph nodes, and other structures.

Meninges. Membranes covering the brain and spinal cord. The thickest, outer meningeal membrane is called the dura mater, which surgical or other medical reports usually just call the "dura."

Mesothelioma. A type of sarcoma arising from cells in the pericardium, the membrane lining the abdominal cavity (peritoneal membrane), or membranes lining the inside of the chest wall and outside of the lungs (pleural membranes). Most mesotheliomas, such as caused by asbestos exposure, are cancerous.

Metastasis. The spread of cancerous cells from their site of origin to other locations in the body. There are two ways in which cancerous cells metastasize: through the blood stream and through the lymphatic vessels. Not all cancers metastasize, and some cancers have a greater likelihood of metastasizing than others. *Distant metastasis* means spread of the cancer far enough beyond the origin of the cancer (primary tumor) that resection cannot be done for cure. Spread of tumor by direct growth is called *extension*, not metastasis.

Note: The listings sometimes say "metastasis" and sometimes use the plural form of the word "metastases." This distinction between the single and multiple metastatic tumors is irrelevant for purposes of the listings. Also, doctors treating patients do not use these words with distinction. If doctors want to emphasize the presence of one metastatic tumor, they will say a *single* metastasis in order to clarify the issue. Similarly, they will usually say *multiple* metastases when they want to emphasize that there is more than one lesion.

Myoma. A muscle tumor, without reference as to whether it is cancerous or benign.

Neoplasm. A tumor that may be either benign or cancerous.

Neurilemoma. A benign tumor arising from nerves. Also known as a *schwannoma*.

Orbit. Eye socket.

Pericardium. Thin membrane that surrounds the heart.

Peritoneum. The membrane lining the walls of the abdomen and pelvis and covering the abdominal organs.

Persistent. Treatment failed to produce a complete remission.

Pleura. The moist membrane that covers the outside of the lungs and the inside of the chest cavity.

Pneumonectomy. Complete removal of a right or left lung.

Poorly differentiated. Reference to cancers that are more malignant—for example, more aggressive in their growth and spread. Differentiation refers to the amount of specialized structure in a cell. Normal cells have a specific structure designed for a specific function—such as bone or brain—while poorly differentiated cancerous cells cannot be identified with any particular type of tissue.

Primary tumor. The first tumor created by a cancer. Other (secondary) tumors may grow from cells that have metastasized from the primary tumor to other locations in the body.

Progressive. The cancer became more extensive after treatment.

Prostate specific antigen (PSA). Substance measured by a blood test as a possible marker for adenocarcinoma cancer of the prostate gland. Normal levels are 0–4 nanograms/milliliter (ng/ml).

Radiotherapy. Treatment with radiation, such as x-rays or gamma rays.

Rectum. The final section of the large intestine.

Recurrent (relapse). A cancer that was in complete remission or was entirely removed by surgery has returned.

Regional lymph nodes. The lymph nodes that are closest to a particular area of the body under consideration and refer to those nodes that first receive lymphatic drainage from a cancerous tumor. Therefore, regional lymph nodes are likely to trap some cancerous cells. If regional nodes are not involved with cancer it is a good prognostic sign

that perhaps the cancer has not spread beyond the tumor to more distant places in the body (distant metastasis). If the regional nodes are involved with cancer, the reasonable presumption is that the cancer may have spread beyond them.

Resection. Surgical removal of tissue.

Rhabdomyoma. A benign tumor of skeletal muscle. Skeletal muscle is that under voluntary control, such as in the arms and legs. The muscles of the neck, tongue, face, abdomen, and back are also skeletal muscles.

Rhabdomyosarcoma. A malignant tumor of skeletal muscle, such as a cancer originating in a thigh muscle.

Sarcoma. Cancers of connective tissue, such as those involving bone, muscle, and cartilage. For example, cancers of muscle are various types of myosarcoma. Cancers of cartilage are chondrosarcomas. Cancers of bone are osteosarcomas.

Sentinel node. The first lymph node that receives lymphatic drainage from a tumor. If the sentinel node is negative for cancer, it is important prognostic information that the cancer may not have spread to more distant sites from the primary tumor.

Squamous cell carcinoma (SCC). Carcinoma that arises from squamous cells. Squamous cells form the outside of the skin, the lining of the mouth and nasal passages, larynx, and the lining of the bronchial airways in the lungs. Also known as *epidermoid carcinoma*.

Staging. A standardized way of describing how much a particular kind of cancer has spread. Staging systems vary between cancer types, but usually involve Stages I, II, III, and IV. Stage IV cancers are the most advanced. Sometimes, the letters "A" or "B" are also used, such as Stage IA soft tissue sarcoma.

Systemic. Referring to the body as a whole.

Temporal fossa. The area defined by the temporal bone on the sides of the skull.

TMN classification. A classification system used for staging cancer. T refers to the size of the primary tumor, N refers to the degree of lymph node involvement around the tumor, and M refers to the degree of metastasis of the cancer. TMN classification systems vary with the type of cancer involved.

Topical drugs. Drugs applied to the surface of the body, such as the skin.

Tracheostomy. Surgically placed opening through the neck into the trachea. May be temporary or permanent and is used to connect a respirator for mechanical ventilation for patients who need assistance in breathing. Patients who have had a laryngectomy also have a tracheostomy.

Tumor. Abnormal proliferation of cells in one place, forming a mass. Tumors can be either benign or malignant. Also known as a *neoplasm*.

Unresectable. Surgery was done, but the cancerous tumor could not be completely removed. Even microscopic amounts of remaining cancer count as unresectable.

B. General Information

Factors that the SSA uses to determine the level of impairment from cancer include:

- the type of cancer
- the location of the cancer
- the degree that the cancer involves other normal tissues
- the response to therapy, and
- the severity of residual problems after treatment.

Treatment of cancer usually involves surgery, radiation, hormones, chemotherapy, or some combination of treatments. There are also treatments using antibodies.

1. Diagnosis

The diagnosis of cancer must be established based on the signs, symptoms, and laboratory findings. The site of the primary cancerous tumor must be documented, as well as sites of recurrent cancer and cancer that has spread to other parts of the body to produce secondary tumors (metastatic tumors). If surgery has been done, the SSA requires a copy of the operative note that the surgeon dictates about the procedure, as well as a report on the gross visual and microscopic examination of any surgical specimens removed from the patient. Microscopic examination of tissue specimens by a pathologist is critical to the accurate diagnosis of cancer. If these documents are not obtainable by the SSA, then the summary of hospitalization or a report from the treating doctor

must include details of the findings at surgery and the results of the pathologist's gross and microscopic examination of the tissues. However, the SSA much prefers the actual reports of the surgeon and pathologist.

2. Spread of Cancer (Metastasis)

In order to prove the diagnosis of a primary cancerous tumor, whether originating in bone or elsewhere, a biopsy is required. Metastatic tumors are ideally diagnosed with biopsy also. However, the biopsy of metastatic lesions is often not practical for a number of reasons. For example, the patient may be too sick for surgery, or the metastatic lesion may be in a location difficult to reach surgically—such as a deep brain lesion. Imaging studies such as radionuclide scans, magnetic resonance imaging (MRI), computerized axial tomography (CAT) scans, and even plain x-rays may provide a reasonable justification to think that an abnormality seen somewhere in the body is a metastatic cancer. In some instances, it is difficult to decide whether a bone lesion is cancer, and medical judgment is required. However, if the doctor responsible for treating a claimant's cancer thinks that a lesion is a metastatic cancer and treats it accordingly, the SSA should not dispute that judgment in its determination. If a treating doctor tells the SSA that he or she thinks something seen on x-ray or other imaging studies is a metastatic cancer, but doesn't treat it as such, then the statement to the SSA would be treated as suspect in motive.

When a cancerous tumor has apparently been completely removed surgically and has not spread beyond the regional lymph nodes, the SSA usually assumes that further spread or recurrence of cancer is not likely in the near future. However, in some of the listings, the SSA considers some forms of cancer disabling, even though they are not disabling at the time of application for benefits. This conclusion is based on the probability of progression of the cancer, even if there is apparent removal of all of the cancer. In such instances, medical evidence should include a report of a recent examination describing the location and extent of any cancer present, as well as any impairment remaining after treatment.

For disability determination purposes, "distant metastases" or "metastases beyond the regional lymph nodes" refers to spread beyond an area that could be completely removed with the usual radical surgery (called radical en bloc resection) for the cancer involved. It is important to understand that a distant metastatic lesion is sometimes surgically removed, but this does not alter the fact that distant metastasis has occurred and there is a high probability that cancer will appear in other locations. For example, suppose a claimant with lung cancer is found to have a single tumor in the brain that consists of lung tumor cancer cells, which are a distant metastasis of the lung cancer. If the brain metastasis was removed surgically or otherwise treated to disappear, the treatment would not change the fact that the claimant has distant metastasis for purposes of the listings.

When a cancerous tumor has metastasized beyond the regional lymph nodes, the impairment will usually be found to meet the requirements of the listings. However, there are exceptions, such as hormone-dependent tumors, tumors sensitive to radioactive isotopes, and metastases from seminoma of the testicles that are controlled by definitive therapy. Such exceptions are noted in the listings concerned.

3. Recurrence or Incomplete Removal of Cancer

Recurrence of cancer near the site of a previous radical surgical removal of a tumor or evidence of incomplete surgical removal of cancer, is considered "inoperable" (called unresectable) for purposes of the listings. Carcinoma of the breast as described under Listing 13.10© is an exception. The length of time from radical surgery to recurrence does not matter for purposes of allowance under the listings—years could pass between the original surgery and a recurrence of cancer. However, the time interval to recurrence could affect when the medical *onset* of disability is granted by the SSA.

How Doctors Tell If Cancer Is Removed

When a pathologist microscopically examines surgically removed tissue, such as a cancerous tumor, he or she carefully examines the area where the surgeon's scalpel cut. If this surgical margin has even microscopic cancer cells, then the surgeon may not have gotten all of the cancer and a wider removal of tissue will be required, if possible. This is why surgeons send specimens for frozen section evaluation by a pathologist while the patient is still on the operating table.

Later, the pathologist will use tissue stains to make more permanent slides and write a definitive, final report. In cases where the permanent, final microscopic examination shows any cancer cells still at the surgical margin, then the SSA must conclude that removal of the cancer was incomplete. For purposes of the listings where relevant, this means the cancer was "unresectable" even though only microscopic amounts of cancer remain in the patient. Such cells are enough to cause a recurrent tumor and its progression. Under such circumstances, the SSA should not claim there is complete removal of a cancer.

Local recurrence of cancer in the area of a previously incomplete removal may still be cured with radical surgery. Therefore, recurrence of a still completely removable tumor is not the same as recurrence after radical surgery; recurrence after radical surgery has a grave prognosis. On the other hand, even the local recurrence of some cancers results in allowance under some listings. Also, the tissue type and site of involvement are not necessarily indicators of the degree of impairment in some cancers, such as the lymphomas. The specific listings for specific cancers take these facts into account in their requirements.

4. Duration of Disability for Cancer

In the adult listings, when the original tumor and any metastases have apparently disappeared and have not been evident for three or more years, the impairment cannot meet the criteria under any cancer listing. This also means, however, that the SSA will consider a claimant to be at the allowance level (eligible for benefits) for a minimum of three years. This is true even if the cancer has apparently disappeared in less than three years. This applies to new claims for disability and to beneficiaries already receiving disability benefits. The "three year rule" also applies to "recurrent" cancer in those listings that specify recurrence as an allowance. Counting of time starts again from the date of recurrence.

5. Other Impairments and Treatment Side Effects

Any remaining impairments present after treatment for cancer that are not considered under these listings, should be evaluated under whatever listings are appropriate for such persistent medical problems. Even if a cancer does not satisfy the requirements of a listing, the treatments may. Given that the resulting side effects vary widely among different people, each case must be considered on an individual basis. It is essential that the SSA obtain a description of the complications or any other adverse response to therapy such as nausea, vomiting, diarrhea, weakness, skin (dermatologic) disorders, or mental disorders resulting from treatment. Since the severity of the side effects of anticancer chemotherapy may change during the period of drug administration, the decision regarding the impact of drug therapy should be based on a sufficient period of therapy to allow reasonable consideration of its effect on the claimant.

6. Onset of Disability in Cancer Cases

Cancers differ in their rate of growth. Some grow slowly over a period of many years and others are fatal in a few months. When the SSA has no evidence about a claimant's health before their diagnosis of allowance-level cancer, a reasonable medical onset must be established, if relevant to the case. To establish the medical onset of disability before the time a cancer is first shown to be inoperable or beyond control by other types of treatment requires medical judgment. This judgment must be based on medically reported symptoms, the specific type of

cancer, the location of the cancer, and the extent of cancer spread when first demonstrated to be present.

It is reasonable and common for the SSA to recognize a medical onset of someone's disability up to six months before the person was shown to have cancer where there is no prior evidence to permit a more accurate determination. However, this statement is not a formal regulation used by the SSA. Medical onset dates do not necessarily determine when benefits begin, since laws and nonmedical administrative rules and regulations also affect when benefits can start. See Chapter 10 for a discussion of onset.

As in other serious medical disorders, disability determinations involving cancer cases are far beyond the educational capacity of disability examiners, claim managers, or other nondoctors working for the SSA. You should insist that your medical impairments be evaluated by a medical doctor or osteopath and that doctors are not merely signing off on documents given to them by nondoctors.

C. Specific Listings and Residual Functional Capacity

The listings that follow are in the federal regulations. They have been interpreted and commented on for greater ease of understanding while explaining their requirements. It is impossible to discuss here all of the medical possibilities related to every kind of disorder, and you may need to seek help from your treating doctor to more fully understand how your particular impairment relates to these listings. The discussion of residual functional capacity does not apply to children.

1. Listing 13.02: Head and Neck Cancer (Adults)

This listing only concerns soft tissue tumors. Head and neck cancers considered under this listing do not include brain tumors (Listing 13.13), salivary gland tumors (Listing 13.08), thyroid gland tumors (Listing 13.09), or tumors of the lower jawbone (mandible). Also, tumors of the upper jawbone (maxilla), eye socket (orbit), or area near the temporal bone of the skull (temporal fossa) are evaluated under another Listing (13.12). Most head and neck cancers are squamous cell carcinoma (SCC), also known as epidermoid carcinoma, and are usually caused by smoking or chewing tobacco. They can arise in the nose, sinuses, throat, gums, tongue, or elsewhere in the mouth. Smoking and chewing tobacco can also contribute to the development of esophageal cancer, stomach cancer, colon cancer, bladder cancer, and kidney cancer. These cancers are evaluated under other listings.

The pyriform sinus is a space in the back part of the throat and refers to either the right or left pyriform sinuses. Involvement of this area with cancer is an extremely poor prognostic sign, because such cancers tend to be aggressive and also because there is good lymphatic drainage that can spread the cancer. The pyriform sinus cannot be seen by a routine examination of the mouth and throat using an ordinary tongue blade and light, because it is down just below the back of the tongue in an area of the throat called the hypopharnyx. Cancer in the back (posterior) part of the tongue also has a poor prognosis, and that is why it is included here.

a. Listing Level Severity

For your condition to be severe enough to meet this listing you must have Ⓐ, Ⓑ, Ⓒ, Ⓓ, or Ⓔ, below.

Ⓐ Inoperable or unresectable cancer.
Ⓑ Persistent cancer after treatment.
Ⓒ Recurrent cancer in any degree after treatment, except for local recurrence on a vocal cord.
Ⓓ Metastasis beyond the regional lymph nodes.
Ⓔ Any other cancer not addressed in Ⓐ through Ⓓ.

b. Residual Functional Capacity

In people who have undergone a laryngectomy, the RFC must take into account how well artificial methods of speech can be learned. Some claimants can use an electronic device held to the side of the neck, about 20–40% can learn esophageal speech using air in the esophagus, and some patients receive implanted prostheses to help them speak. However, normal speech can never be achieved.

Claimants with removal of parts of the tongue, jaw, or other facial structures may not only be disfigured, but have difficulty speaking. Surgical facial

deformities, especially involving the mouth, can be associated with malnutrition because of an inability to eat normally.

Patients with head and neck cancer frequently require removal of lymph nodes in their neck in order to determine how far the cancer has spread. During surgery, the surgeon must be careful not to cut the right or left spinal accessory nerves to the muscles that help raise the shoulders. Some surgeons are more careful than others. If that nerve is cut, the ability to lift will be affected, especially regarding overhead lifting or sustained overhead work with the shoulder affected.

2. Listing 13.03: Skin Cancer (Adults)

The most common skin cancers are basal cell carcinomas (BCC) and squamous cell carcinomas (SCC). These cancers can be very destructive to tissue, but rarely metastasize and can be completely cured if diagnosed early. They are not sarcomas and are not considered under this listing, which deals with the far more serious cancers.

Malignant melanoma is a very dangerous form of cancer usually starting as a pigmented (dark) spot on the skin. Rare forms are not pigmented and are known as amelanotic melanoma. Most little spots on the skin are harmless, but melanoma spreads rapidly to internal organs and is very difficult to control. With increasing exposure to sunlight the risk of melanoma increases. Melanomas often occur on the back, but could be anywhere, including the face. Unlike most freckles or other harmless dark spots on the skin, melanomas tend to have variations in color and more uneven edges. Melanoma is now the seventh most common cancer and its incidence continues to increase. About 75% of skin cancer deaths are caused by melanoma, although it accounts for only a small percentage of skin cancers overall. Most skin cancers are basal cell carcinoma (about 80%) and squamous cell carcinoma (about 15%), but these cancers are not nearly as deadly as melanoma.

Anyone with a colored (pigmented) skin abnormality should see a skin specialist (dermatologist) if that lesion is rapidly growing, irritated, or painful, has multiple shades of color, has an irregular border, or is asymmetric in shape. Ninety percent of melanomas can be diagnosed by an experienced dermatologist's visual examination, but a biopsy is necessary for definitive diagnosis. A small delay in proper diagnosis can mean the difference between life and death, because even the smallest depth of invasion of the cancer into the layers of the skin strongly affects the probability of the melanoma spreading to other locations in the body. If the melanoma diagnosis can be made while the cancer has invaded less than the tiny distance of 1 millimeter into the dermal layer of the skin, a 90% cure rate can be obtained. Once metastasis occurs, the prognosis is truly grim. Time is critical, because even a small harmless looking melanoma on the skin may have already spread extensively throughout the body. With a suspicious skin lesion, it is folly to wait and see what happens next. When there is distant metastasis, many patients will be dead within three years.

Angiosarcomas are rare and dangerous cancers arising from blood vessels (hemangiosarcomas) or lymphatic vessels (lymphangiosarcomas). Angiosarcomas arising in the skin have a poor prognosis, with a nearly 90% death rate five years from diagnosis.

a. Listing Level Severity

The claimant's condition must match Ⓐ or Ⓑ, below.

Ⓐ Metastases to regional lymph nodes or beyond.

Ⓑ Melanoma with either 1 or 2:

1. Recurrent cancer after wide surgical excision (a new primary cancer is not "recurrent").
2. Metastases to lymph nodes large enough to be felt (palpable) or metastases to adjacent skin (satellite lesions) or elsewhere.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. Most cancers severe enough to cause substantial limitations would be an allowance under this listing without consideration of RFC. In those cases that do not meet the listing, it is important, during RFC consideration, to note that skin areas affected by treatment or cancer should not be exposed to any chemicals or excessive water.

If a melanoma were diagnosed early enough to be removed completely, it is quite possible that there

would be no significant residual impairment. If a claimant has survived three or more years without further evidence of cancer, he or she would no longer qualify under the listing and might require an RFC. For example, there are people who have an arm amputated because of melanoma. They would be able to do no more than light work. Others may have had a leg or foot amputated and might not be able to stand six to eight hours daily or use leg controls. The most common eye cancer is a melanoma. If you had melanoma in an eye that had to be removed, then you would not be able to perform jobs requiring good peripheral vision—such as working at unprotected heights or around hazardous machinery.

3. Listing 113.03: Malignant Solid Tumors (Children)

Solid cancerous tumors in this listing do not include leukemia. This listing also does not include brain tumors (Listing 113.13) or thyroid tumors (Listing 113.09) or other solid cancers that are specifically evaluated under other listings. Examples include osteosarcomas of bone or soft tissue sarcomas such as those arising from muscle or the histiocytosis syndromes.

The histiocytosis syndromes, also known as Langerhans cell histiocytoses (LCH), consist of eosinophilic granuloma, Letterer-Siwe disease, and Hand-Schüller-Christian disease. Bones and skin are particularly likely to be involved with these disorders, but other organs such as the liver and lungs may also be affected. However, you don't have to understand these histiocytosis cancers to know that if a child is diagnosed with one of them, the child will be allowed benefits under this listing. The SSA states that an exception is a solitary eosinophilic granuloma tumor, which cannot qualify under the listing.

a. Listing Level Severity

For children with this condition, the SSA will either

Ⓐ Consider the child disabled for two years from the time of initial diagnosis, or

Ⓑ Consider the child disabled for two years from the time of recurrence of active disease at any time, in any degree or any location.

4. Listing 13.04: Soft Tissue Sarcoma (Adults)

Soft tissue sarcomas are any type of connective tissue cancer that does not include bone. Possible examples include sarcomas of muscle (for example, leiomyosarcoma, rhabdomyosarcoma), sarcomas of synovial membranes (synovial cell sarcoma), and sarcomas of fatty tissue (liposarcomas). Soft tissue sarcomas affecting the skin are considered under Listing 13.03.

Sarcomas are generally very dangerous cancers. Treatment can involve surgery (including amputation of a limb), chemotherapy, and radiotherapy. Such claims must be evaluated on the basis of all the facts in a particular case, including the type of sarcoma, history, and response to treatment and prognosis. Whether a sarcoma is controlled with prescribed therapy is a matter of medical judgment. However, any distant metastasis is not likely to be controlled and should meet the listing. There could be exceptions, such as a single metastatic tumor that is removed along with the primary tumor. Consideration would also have to be given to the type of cancer involved—more aggressive types of sarcoma should be considered more leniently for meeting the listing. For example, a person might have a low-grade malignancy like synovial cell sarcoma that is compatible with a long life; alternatively, one might have an aggressive cancer of a thigh muscle—a rhabdomyosarcoma. Informed medical judgment would not look at these cancers in the same way.

a. Listing Level Severity

For your condition to be severe enough to meet the listing, you must have soft tissue sarcoma that is not controlled with prescribed therapy.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. For example, amputation of an arm or leg in an attempt to remove all of a sarcoma before it spreads would require consideration. Removal of an arm restricts a claimant to one-armed light work. If damage to a lower

extremity (leg or thigh) is so great that the claimant cannot stand and walk for at least six hours daily, then a residual function capacity (RFC) cannot be higher than sedentary work. For example, synovial cell cancer in a knee joint and treatment for it can affect the ability to walk, stand, and use leg controls. A rhabdomyosarcoma excised from a thigh muscle is likely to take a lot of muscle tissue with it; even if there is a cure, that leg muscle strength is going to be affected.

5. Listing 13.05: Lymphoma (Adults)

The lymphatic system of the body does not carry blood. It consists of small tubes carrying lymph fluid and is important in keeping excess fluid from building up in certain areas of the body. For example, blockage of lymphatic vessels in the legs will result in swelling. Large numbers of lymph nodes can be found in the axillae, neck, and around the intestines. But they are also found in many other locations.

Lymph nodes are specialized collections of cells found in various locations along the system of lymph vessels. Lymph nodes function for the immune system and contain lymphocytes. For example, lymph nodes can trap and destroy bacteria. Lymphoma is cancer of the lymph nodes and spleen that produces abnormal lymphocytes. However, lymphoma can invade any organ of the body. Advanced lymphomas can result in death, but they usually respond much better to treatment with drugs than other forms of cancer. Lymphomas are the least dangerous of all the malignancies in the cancer listings.

Hodgkin's lymphoma and non-Hodgkin's lymphoma are two important classifications. Hodgkin's lymphoma (Hodgkin's disease) is less dangerous than non-Hodgkin's lymphoma, but both often respond well to treatment. There are further classifications of non-Hodgkin's lymphoma by the exact type of lymphocytes involved. Make sure you know whether your doctor has evidence that the lymphoma is persistent, or even progressive. This information should be put either in a letter to the SSA or in your medical records where the SSA can see the information. Certainly, lymphoma appearing in new locations during treatment would have to be considered progressive, or at least persistent. It is important that your doctor convey to the SSA whether the lymphoma is an intermediate or high-grade (very aggressive) lymphoma, or a lesser aggressive low-grade lymphoma. However, your doctor's opinion should be consistent with the other medical evidence in your treatment records if the SSA is to take it seriously.

Mycosis fungoides (MF) is also evaluated under this Listing. MF has several variants, one of which is the Sèzary syndrome—a type of lymphoma cancer in which T-lymphocyte cells invade the skin. T lymphocytes are normally part of the body's immune system. In mycosis fungoides these T-lymphocytic cells are cancerous, but the cancer is of a low-grade kind and a patient may have itchy skin patches for up to ten years before the diagnosis is made. In other words, MF is a low-grade T-cell lymphoma. The median survival after diagnosis is ten years, and if there is only limited skin involvement a patient may die of other causes rather than mycosis fungoides. In the more advanced stages involving spread of MF to internal organs (visceral involvement), median survival may drop to three years—usually from complications such as infection.

Bone marrow or stem cell transplantation is becoming a more common treatment. If it has been less than a year since that procedure was done, you can easily satisfy the Listing (see Part Ⓒ, below).

Note that "recurrent" in this Listing means any amount of cancer, anywhere in the body, without regard to prognosis or other considerations.

a. Listing Level Severity

For your condition to be severe enough to meet the Listing, it must match Ⓐ, Ⓑ, or Ⓒ below.

Ⓐ Non-Hodgkin's lymphoma, as described in 1 or 2:

1. Intermediate or high-grade lymphoma persistent or recurrent following initial cancer treatment.
2. Low-grade or indolent lymphoma requiring initiation of more than one course of anticancer treatment within a consecutive 12-month period. Consider under a disability from at least the date of starting the treatment regimen that failed within 12 months.

Ⓑ Hodgkin's disease with failure to achieve clinically complete remission, or recurrent disease within 12 months of completing initial anticancer therapy.
Ⓒ With bone marrow or stem cell transplantation. Consider under a disability until at least 12 months from the date of transplantation. Thereafter, evaluate any remaining medical problems under the criteria of the affected body system.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. Removal of lymph nodes may cause no difficulties. In other instances, removal of large numbers of lymph nodes may result in some swelling in the part of the body normally drained of lymph fluid along the path of those nodes. Most RFCs apply to lymphoma that is present, but not progressive as required by the listing.

6. Listing 113.05: Lymphoma (Children)

See comments under adult Listing 13.05. Indolent or low-grade lymphomas are not considered, because they are rare in children. If one did occur, it could be evaluated under adult Listing 13.05 Part Ⓐ2.

a. Listing Level Severity

For the child's condition to be severe enough to meet the Listing, it must match Ⓐ, Ⓑ, or Ⓒ below.
Ⓐ Non-Hodgkins lymphoma (including Burkitt's lymphoma and anaplastic large-cell lymphoma) that is persistent or recurrent despite initial treatment. Recurrence of non-Hodgkin's lymphoma anywhere, in any degree, after intial treatment always satisfies this Listing.
Ⓑ Hodgkin's disease in which complete remission could not be obtained, or recurrent Hodgkin's lymphoma occurring within one year of finishing the initial treatment. Note that if there is any objective evidence of lymphoma remaining, complete remission has not been achieved.
Ⓒ With bone marrow or stem cell transplantation. Consider under a disability until at least 12 months from the date of transplantation. Thereafter evaluate any remaining medical problems under the criteria of the affected body system.

7. Listing 13.06: Leukemia (Adults)

Leukemia is a form of cancer affecting the blood-forming organ (bone marrow). The white blood cell level rises very high. The listing applies to both acute and chronic leukemia.

Acute Leukemia. The most dangerous forms of leukemia are the acute forms, such as acute myelocytic leukemia, acute lymphocytic leukemia, and acute monocytic leukemia. Acute refers to leukemias that are more aggressive and generally have a poorer outcome than chronic leukemias. Acute leukemia may be accompanied by lymph node enlargement, severe fatigue, anemia, decrease in platelets with bleeding, invasion of body organs with large numbers of cancerous white cells, and infection. Infection is a frequent cause of death. Untreated acute leukemias are fatal in several months. With treatment, you may live several years or even be cured.

To prove the initial existence of leukemia, the SSA requires a bone marrow biopsy or bone marrow aspiration. Examination of the peripheral (circulating) blood cannot be used for the initial diagnosis of leukemia. The SSA does accept the examination of the peripheral blood or cerebrospinal fluid to demonstrate recurrent leukemia. Copies of all laboratory reports, including pathology reports of bone marrow biopsy and aspiration results, must be available to the SSA to demonstrate any type of leukemia.

If you have any kind of acute leukemia, you should be allowed under part Ⓐ of the listing. You can be without any evidence of acute leukemia at the time of disability determination and still qualify under the listing as long as the determination is within two years of the date of a valid diagnosis. The reason the SSA automatically gives benefits two years after diagnosis is the poor prognosis for leukemia. Even with an initial remission, the probability of recurrence and death is high during the first two years after diagnosis. This is not to say you should give up hope if you have leukemia—cures do happen and new treatments are continually being researched.

After two years from the initial diagnosis, you no longer automatically qualify, and must be evaluated on the basis of what residual impairment is present. Although not stated by the listing, it would seem medically reasonable that recurrent acute leukemia

after a period of complete remission should be treated like a new initial diagnosis. This would be consistent with the way other adult cancers are treated. Furthermore, recurrence should entitle you to another two years' minimum of disability, because such relapses are less likely to be controlled than the initial onset of the disease.

If you have had a transplant the listing rules are a little different. Attempts to cure leukemia by creating a normal bone marrow are becoming more common. This therapy can consist of either bone marrow transplantation or transplantation of stem cells into the patient's marrow. Stem cells are the parent cells for all other marrow cells. Once the marrow starts making normal blood cells, they can then enter the blood stream rather than the cancerous cells of leukemia. Because prognosis is better with bone marrow or stem cell transplants, you can only receive one year of automatic benefits before reevaluation after transplantation.

Chronic Leukemia. The most common forms of chronic leukemia include chronic myelocytic leukemia (CML) and chronic lymphocytic leukemia (CLL). Other types of chronic leukemia are prolymphocytic leukemia (PLL), hairy cell leukemia, and T-cell chronic lymphocytic leukemia (T-cell CLL).

Chronic myelocytic leukemia can undergo what is known as a blast crisis or blastic transformation, in which the abnormal cells of CML are replaced with the even more cancerous cells of acute myelocytic leukemia (AML). The usual outcome of a blast crisis is death, most often from infection. When CML turns into AML, the claimant qualifies for at least two years of benefits automatically under part Ⓑ1 of the listing. An exception is if you have had a stem cell or bone marrow transplant. In that case you would be re-evaluated one year after the transplant. Even if you have chronic leukemia that has not changed into an acute type of leukemia, you would still receive at least a year of benefits if you had a stem cell or bone marrow transplant (part Ⓑ2a).

Even though the listing only mentions chronic myelogenous leukemia, any type of chronic leukemia that has changed into an acute leukemia should be allowed under part Ⓑ1. Both prolymphocytic leukemia and T-cell chronic lymphocytic leukemia have as poor a prognosis as CML, and should be evaluated in the same way as CML although not specifically mentioned by the SSA.

Generally speaking, chronic lymphocytic leukemia (CLL) is often a slowly progressive leukemia in which patients have no symptoms, nor is treatment always necessary at the time of diagnosis. CLL occurs almost exclusively in older people and is often compatible with a life span of ten to 20 years. However, if you are one of the 2% of people with CLL who have the more dangerous T-cell CLL, your claim should be treated by the SSA like CML, as discussed above, even though no regulation requires the SSA to do so.

Hairy cell leukemia frequently responds to treatment with long-lasting remissions. About 10% of people with this disorder remain asymptomatic for many years without needing treatment. Infections and an enlarged spleen can be a particular problem during treatment. Like CLL, hairy cell leukemia is not a disorder that automatically qualifies under the listing; each case must be evaluated individually.

Part Ⓑ2b grants benefits in any case in which chronic leukemia worsens despite initial treatment.

If all of this sounds confusing, just remember these important points:

- Acute leukemias are allowances for at least two years, unless there has been a transplant, in which case allowance is for at least one year. (Part Ⓐ.)
- Chronic leukemias that undergo blast crisis to acute leukemia are allowances for at least two years, unless there has been a transplant. In that case, allowance is for at least one year, just as for acute leukemia. (Part Ⓑ1.)
- Chronic leukemias without blast crisis, but with transplants, are allowances for at least one year after transplant. (Part Ⓑ2a.)
- Chronic leukemias without blast crisis and without transplants are allowances if the cancer worsens despite initial treatment. (Part Ⓑ2b.)
- Although the listing only mentions CML, other acute and chronic leukemias which are as dangerous as CML should be considered of equal severity.

a. Listing Level Severity

For your condition to be severe enough to meet the listing, you must have Ⓐ or Ⓑ below.

Ⓐ Acute leukemia (including T-cell lymphoblastic lymphoma). Consider under a disability until at least 24 months from the date of diagnosis or relapse, or at least 12 months from the date of bone marrow or stem cell transplantation, whichever is later. Thereafter, evaluate any residual impairment(s) under the criteria for the affected body system.

Ⓑ Chronic myelogenous leukemia, as described in 1 or 2:

1. Accelerated or blast phase. Consider under a disability until at least 24 months from the date of diagnosis or relapse, or at least 12 months from the date of bone marrow or stem cell transplantation, whichever is later. Thereafter, evaluate any remaining medical problems under the criteria for the affected body system.
2. Chronic phase, as described in a or b:
   a. Consider under a disability until at least 12 months from the date of bone marrow or stem cell transplantation. Thereafter, evaluate any residual impairment(s) under the criteria for the affected body system.
   b. Progressive disease following initial cancer therapy.

b. Residual Functional Capacity

You may become asymptomatic once your leukemia is controlled. However, you might have some residual impairment from a complication of the leukemia or toxicity of chemotherapy that would require RFC restriction after two years, even though the leukemia itself is controlled. For example, you might suffer some weakness or paralysis of an arm or leg as a result of a stroke, or continuing easy fatigability from damage to the heart. Each case must be evaluated individually.

8. Listing 113.06: Leukemia (Children)

See comments under adult Listing 13.06.

a. Listing Level Severity

This child listing has the same criteria as adult Listing 13.06 with one important exception: Juvenile chronic myelocytic leukemia (JCML) should be evaluated as if it is acute myelocytic leukemia—under part Ⓐ of the listing—because it is more serious than CML. (Because JCML is a rare form of childhood leukemia, it is treated differently than other cases of CML in childhood.)

9. Listing 13.07: Multiple Myeloma (Adults)

Myeloma is a disease in which plasma cells are increased, and is most common after age 40. Plasma cells are manufactured in the bone marrow and are involved in the production of antibodies. In normal bone marrow, only a few percent of the cells are plasma cells; they are increased in myeloma. Plasma cells are not normally seen in the peripheral blood, but may be present in myeloma. Myeloma is commonly referred to as multiple myeloma.

Your treating doctor would have done the appropriate diagnostic testing before you apply for disability. Your bone marrow biopsy would show increased numbers of plasma cells—10% or more. Electrophoresis using a blood or urine sample would show increased amounts of antibody produced by the increased numbers of plasma cells. X-rays would show bone lesions.

The increased numbers of plasma cells in myeloma are most likely to produce excessive amounts of the antibody known as immunoglobulin G (IgG) in the serum. Immunoglobulin A (IgA) is the second most commonly produced antibody. Electrophoresis may be done on urine samples to detect abnormal antibody fragments produced by myeloma. Such antibody fragments in the urine are known as Bence Jones proteins, but they are not always present.

Weakness, loss of appetite, and weight loss are early findings with myeloma. If the disease progresses, you may develop anemia and increasing numbers of infections.

a. Listing Level Severity

For your condition to be severe enough to meet the listing, you must have had electrophoresis testing showing appropriate abnormalities for myeloma. In addition, you must satisfy Ⓐ or Ⓑ, below.

Ⓐ Failure to respond (improve) with initial anticancer treatment (including progressive disease).

Ⓑ With bone marrow or stem cell transplantation. Consider under a disability until at least 12 months

from the date of transplantation. Thereafter, any remaining medical problems are evaluated under the criteria for the affected body system.

b. Residual Functional Capacity

Cases must be evaluated individually, taking into account the effects of any residual impairment including anemia, kidney failure, bone pain or fractures, weakness, fatigue, and side effects of chemotherapy. If you have anemia, see the RFC comments under Listing 7.02 (CD Part 7). Even if you don't have severe bone pain, you could nevertheless have bone lesions with lesser pain that limit the amount of weight you can lift. Bone lesions in the spine can lead to spinal fractures and even damage to the spinal cord. If you have spinal lesions—even if they don't cause severe pain—you probably shouldn't have an RFC for more than light work. A large lesion in the spine should restrict you to no more than sedentary work, even if it is not painful enough to qualify under the listing.

10. Listing 13.08: Salivary Gland Cancer (Adults)

The major salivary glands are the parotid, sublingual, and submandibular glands. These are paired, right and left glands. The parotid glands are on the sides of the face, the sublingual glands are under the tongue, and the submandibular glands are under the lower jaw.

It is important to know the names of some cancerous and noncancerous salivary gland tumors, in order to understand those that might be an allowance under this listing. There are many types of salivary gland cancer that vary in their degree of malignancy. For example, mucoepidermoid carcinomas and acinic cell carcinomas are usually low-grade cancers that can be treated for cure or long-term survival, while there are other poorly differentiated and highly malignant carcinomas that will kill the majority of patients within five years. Treatment of salivary gland cancers involves surgical removal of the gland affected and may also involve radiation therapy.

Noncancerous salivary gland tumors include Warthin's tumor (papillary cystadenoma lymphomatosum), oncocytomas, monomorphic adenomas, benign lymphoepithelial tumors, and benign mixed tumors (pleomorphic adenomas). These tumors cannot be considered under this listing.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, you must have any carcinoma or sarcoma type cancer of any salivary gland that has spread beyond your regional lymph nodes (distant metastasis).

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. Highly malignant parotid gland tumors may involve bone, skin, and the facial nerve. Damage to the facial nerve can produce facial paralysis of that side of the face. The ability to stand, walk, lift, or carry would not be affected by salivary gland cancer although during the period of treatment these activities could be limited by the side effects of treatment in the form of drugs or radiation.

11. Listing 13.09: Thyroid Gland Cancer (Adults)

The thyroid gland makes thyroid hormone and is located in the front of the neck. Normally a doctor cannot feel the thyroid gland during physical examination of the neck, but a nodule such as a cancer might be felt. An enlarged thyroid gland is called a goiter and can be very prominent, but goiters do not mean cancer is present. The cancers of the thyroid are various types of carcinoma that differ in their degree of malignancy. Overall, about 90% of patients will survive the cancer, including those with late stages of cancer. Papillary and follicular carcinomas are the most common. There are also less frequent medullary and anaplastic (nondifferentiated) carcinomas, which are more serious. Most thyroid cancer can be controlled with treatment, even when there is metastasis to other parts of the body, such as the lungs. There are exceptions, but most thyroid cancers can be cured. Only a minority of cases qualify under the listing.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, you must have Ⓐ or Ⓑ, below.

Ⓐ Anaplastic (undifferentiated) carcinoma.
Ⓑ Any thyroid carcinoma cancer that has spread beyond the regional lymph nodes (distant metastasis) and that is worsening despite treatment with radioactive iodine.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. However, RFC is not usually an issue in thyroid cancer cases, because, if they are successfully treated, there is usually no residual impairment and if they are not successfully treated they meet the listing.

12. Listing 113.09: Thyroid Gland Cancer (Children)

See comments under adult Listing 13.08.

a. Listing Level Severity

See comments under adult Listing 13.08.

13. Listing 13.10: Breast Cancer (Adults)

Breast cancer is a very serious malignancy occurring in women and, rarely, men. It is one of the most frequent types of cancer the SSA sees and so you should have a good understanding of how the SSA evaluates such claims. The most common type of breast cancer is infiltrating ductal carcinoma, accounting for about two-thirds of cases. Some other types in order of frequency in which they occur include lobular carcinoma, medullary carcinoma, colloid carcinoma, comedocarcinoma, and papillary carcinoma. About 1% of breast cancers also involve Paget's disease, which is itching of the nipple with scaling skin changes associated with some combination of oozing, burning, or bleeding from the nipple. In Paget's disease, these abnormalities are caused by invasion of the nipple with cancer that can often be felt in the breast during physical examination. Breast sarcomas are much less common than carcinomas and are also considered under Listing 13.04 for soft tissue sarcomas.

Regular mammograms are important in the early detection of breast cancer, although authorities differ on exactly how often such tests should be done. In addition to the usual x-ray mammograms that most women receive, there are other breast imaging techniques that can help doctors better see inside the breast. These include high frequency sound (ultrasound), heat patterns from the breast (thermography), transillumination of the breast with light, magnetic resonance imaging (MRI), and computerized axial tomography (CAT scans). Despite the number of imaging techniques available for detecting suspicious masses in the breast, biopsy is the only way to obtain an accurate diagnosis.

As in other cancers, early detection is the key to survival of breast cancer, since there is less probability that the cancer has spread to locations that cannot be surgically removed for cure (distant metastasis). Fortunate women with small early cancers might need only a lumpectomy. In these cases surgical reconstruction of the breast might leave little cosmetic deformity. Others may require removal of the entire breast, along with the underlying chest muscles—radical mastectomy. If distant metastasis appears to have occurred, chemotherapy will also be given, but the probability of cure falls drastically when the tumor has spread and cannot be completely removed surgically.

Inflammatory carcinoma (part Ⓑ) is associated with breast inflammation: swelling of the skin (edema), warmth of the skin to touch, erythema, and induration of the skin. A breast lump may also be felt in about half the cases. These are clinical abnormalities and not sufficient for a definitive diagnosis, which must be based on the microscopic evaluation of a skin biopsy specimen that specifically shows invasion of cancer cells into the lymphatic vessels in the skin of the breast area concerned. Inflammatory carcinoma occurs in about 1–5% of breast carcinomas. It has a poor prognosis, even if there is no evidence of metastasis at the time of diagnosis.

The axillary lymph nodes are critically important in the staging of breast cancer, because they are the first nodes that receive drainage from the breast. If the axillary nodes are positive for cancer, there is a greater chance that the cancer has spread past them (distant metastasis). However, spread to the axillary nodes themselves is not distant metastasis and does

not qualify as such under this listing. Also, when breast cancer occurs in both breasts, it is usually not because of distant metastasis from one breast to the other, but two separate primary cancers (part Ⓓ).

Men can have breast cancer and their prognosis is similar to that of women. The risk is higher when the man has female relatives with breast cancer, radiation exposure, a parasitic infection known as schistosomiasis, and the genetic disorder of Klinefelter's syndrome.

a. Listing Level Severity

For your condition to be severe enough to meet the listing, it must match Ⓐ, Ⓑ, or Ⓒ, below. Note that axillary node metastasis does not satisfy any part of the listing.

Ⓐ Locally advanced carcinoma, which means:
- inflammatory carcinoma
- tumor of any size with direct extension to the chest wall or skin, or
- tumor of any size with metastases to the ipsilateral internal mammary nodes (lymph nodes near the sternum on the same side as the breast involved with cancer).

Ⓑ Carcinoma with distant metastases.

Ⓒ Recurrent carcinoma, except local recurrence that goes into remission with anticancer therapy. (Note that any recurrent breast cancer that is not local is an allowance under part Ⓒ, even if controlled with treatment. For example, a single breast cancer nodule recurs in the lung and is completely removed surgically. That person is still an allowance under both parts Ⓑ and Ⓒ.)

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. However, several specific complications of breast cancer surgery that can affect residual functional capacity (RFC) can be mentioned. If only a simple mastectomy is done, then only the breast is removed and none of the underlying chest muscles. This is a slight (not severe) impairment that doesn't produce any significant restrictions on ability to function. If a radical mastectomy is done, removal of the underlying chest muscles can very easily restrict strength enough to preclude heavy lifting. Another potential problem is that if most of the axillary lymph nodes have been removed, then inadequate drainage of lymph fluid from the arm can result in swelling that is quite troubling to the claimant and could affect the ability to use that arm normally.

14. Listing 13.11: Skeletal System Cancer (Adults)

This listing involves any type of cancer affecting bone that is not considered under other listings, such as cancer of the orbit or maxilla (Listing 13.12). There are two ways cancer can involve bone: cancer arising from the bone itself (primary tumors of bone) and cancer that has spread to bone from tumors originating elsewhere in the body. Although it is common for cancers to spread to bone, these cancers are evaluated under the type of primary cancer involved. For example, breast cancer metastatic to bone would be considered under Listing 13.10.

Examples of cancerous primary bone tumors include (but are not limited to) osteosarcoma, chondrosarcoma, Ewing's tumor, malignant giant cell tumor, fibrosarcoma, hemangioendothelioma, reticulum cell sarcoma, and hemangiopericytoma.

An important primary bone tumor is osteosarcoma, which is a highly cancerous growth. Such a tumor would satisfy part Ⓐ of the listing if surgery cannot be performed ("inoperable"). Part Ⓐ is also satisfied, if surgery is done but even microscopic amounts of cancer remain ("unresectable").

Part Ⓑ is satisfied by any cancer that recurs in any location other than its origin (metatases show up which were not known to have occurred before). Part Ⓒ is satisfied by any spread of skeletal cancer beyond the regional lymph nodes.

Part Ⓓ grants an automatic one year of benefits to all primary bone tumors receiving multiple types of treatment (such as chemotherapy plus surgery or radiation) that do not qualify under parts Ⓐ through Ⓒ.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ, Ⓑ, Ⓒ, or Ⓓ, below.

Ⓐ Inoperable or unresectable.

Ⓑ Recurrent tumor (except local recurrence) after initial anticancer therapy.
Ⓒ With distant metastases.
Ⓓ All other tumors originating in bone with multimodal anticancer treatment. Consider under a disability for 12 months from the date of diagnosis. Thereafter, evaluate any remaining medical problems under the criteria for the affected body system.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. In bone lesions, particular attention should be given to how treatment affects the structural integrity of the bones involved. If joint spaces are compromised either by tumor or treatment, an arm or leg could suffer functional loss. Similarly, a cancer could cause collapse of a vertebra with back pain and decreased ability to lift and bend, even if the tumor itself is successfully treated.

15. Listing 13.12: Cancer of the Maxilla, Orbit, or Temporal Fossa (Adults)

This listing deals with cancer in the upper jaw (maxilla), orbit (eye socket), or sides of the skull (temporal fossa). Several forms of cancer may be involved.

Part Ⓐ is satisfied by any carcinoma or sarcoma type cancer, of which osteosarcoma is the most common considered under this listing. Osteosarcomas arising from the temporal bones could also be considered under part Ⓒ. Another possible sarcoma in these bones is an adamantinoma, also known as an ameloblastoma. Adamantinomas rarely metastasize.

Sinuses are cavities in the facial bones. The "antrum" (part Ⓑ) refers to either of the maxillary sinuses, which are located in the facial bones just to the right or left sides of the nose. Carcinoma in this sinus can spread to other sinuses, the orbit, or more distant locations. These are usually squamous cell carcinomas caused by cigarette smoking or dipping snuff.

Cancers of the orbit qualifying under part Ⓒ could be cancers arising from the bones forming the walls of the eye socket, from the eye itself (melanomas of the retina) or other soft tissues around the eye.

Rathke's pouch is the embryonic structure from which the anterior part of the pituitary gland is formed. Remnants of Rathke's pouch that sometimes remain after development of the pituitary gland may give rise to tumors known as craniopharyngiomas. Most craniopharyngiomas are not malignant, but there are rare exceptions. Similarly, tumors arising from the pituitary gland are usually benign, but there are exceptions. Noncancerous pituitary tumors (the great majority) would be evaluated under Listing 11.05 (CD Part 11) for benign brain tumors.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match part Ⓐ, Ⓑ, or Ⓒ, below.
Ⓐ Sarcoma or carcinoma of any type with regional or distant metastasis.
Ⓑ Carcinoma of the antrum with extension into the orbit or ethmoid or sphenoid sinus.
Ⓒ Tumors with extension to the base of the skull, orbit, meninges, or sinuses.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. The cancers in this listing involve the face, so they are not likely to produce restrictions on the amount of weight that can be lifted or the amount of standing or walking that you can do. If vision in one eye is affected, then you would not be able to perform jobs requiring good peripheral vision—such as working at unprotected heights or around hazardous machinery. However, cancers so advanced that they produce significant limitations would probably qualify under the listing without any need to consider RFC. Cosmetic deformity is one of the main problems with treatment of these cancers, if extensive surgery involving the face is required. However, physical appearance is not something that significantly limits the ability to work at most jobs.

16. Listing 113.12: Retinoblastoma (Children)

Retinoblastoma is an eye tumor in children, almost always appearing before four or five years of age. It can be genetic in origin or acquired. Prognosis for

survival is generally good, though loss of vision is common. Removal of the affected eye (enucleation) may be required in some cases.

a. Listing Level Severity

To be severe enough to meet the listing, the child must have retinoblastoma with Ⓐ, Ⓑ, or Ⓒ, below.

Ⓐ With extension beyond the orbit.

Ⓑ Persistent or recurrent following initial anticancer therapy.

Ⓒ With any regional or distant metastasis.

17. Listing 13.13: Cancer of Nervous System (Adults)

Brain tumors are always a serious matter, but particularly so when they are cancerous. Small tumors that are easily accessible and can be completely removed with surgery or radiation have the best prognosis. Depending on the size and location of the tumor, the patient may have headaches, paralysis, or personality changes even after treatment. For example, brain tumors in the brain stem are very difficult to reach surgically and may encroach on areas vital for the regulation of blood pressure, heart beat, and breathing. Important nerve tracts also pass through the brain stem to and from the brain.

Part Ⓐ1 of the listing concerns the more cancerous and aggressive ("high-grade") brain tumors. Astrocytomas are tumors arising from astrocytes and are also referred to as types of malignant glioma. Astrocytomas are graded by the degree of malignancy, from grade I to grade IV. The most cancerous astrocytomas (grades III and IV) also go by the name of glioblastoma multiforme. It is important to know that when a pathologist examines astrocytoma cells under a microscope, various areas of the tumor may have different grades of malignancy. For example, one area of the tumor may be grade II while another area may be grade III or IV. Such tumors are characterized by their highest grade of malignancy and should be so treated by the SSA. Therefore, if a tumor has a combination of grade II cells and grade III cells, then it should be considered grade III. This is to the advantage of the claimant in applying for disability and is also medically reasonable.

Other cancerous tumors that qualify under part Ⓐ1 are medulloblastomas (which occur in the brain stem), ependymoblastomas (which arise from the cells lining the ventricles of the brain), and connective tissue tumors called primary sarcomas. Lower-grade astrocytomas (grades I and II), most oligodendrogliomas, and malignant meningiomas would not qualify under part Ⓐ1 and would need to be evaluated under part Ⓐ2 or part Ⓑ of the listing.

Benign brain tumors, such as most pituitary tumors, ependymomas, clivus chordomas, and meningiomas are evaluated under Listing 11.05 for adults or 111.05 for children (CD part 11).

The diagnosis of most cancers, including brain tumors, is proven by biopsy. However, there may be unusual cases in which the presence of a highly cancerous brain tumor is obvious, as demonstrated by cerebral angiography and CT or MRI scans, but in which a biopsy cannot be done. In these cases, the SSA should not require biopsy evidence for allowance.

Part Ⓑ of the listing concerns cancers of peripheral nerves or nerve roots; cancers arising from the substance of peripheral nerves are rare. Any nerve outside of the spinal cord is a peripheral nerve. Nerve roots are where peripheral nerves begin to form as they exit the spinal cord.

a. Listing Level Severity

To meet the listing, your condition must satisfy Ⓐ or Ⓑ, below.

Ⓐ Brain or spinal cord cancers with 1 or 2:

1. Any of the following cancerous brain or spinal cord tumors on the basis of diagnosis alone:
   - grade III or IV astrocytomas
   - glioblastoma multiforme
   - medulloblastomas
   - ependymoblastomas
   - primitive neuroectodermal tumors (PNETs)
   - diffuse brainstem gliomas (localized tumors do not qualify), or
   - primary sarcomas.
2. Any nervous system cancer that is progressive or recurrent after initial treatment.

Ⓑ Peripheral nerve or nerve root cancer with 1 or 2:

1. Metastatic (regional or distant).
2. Progressive or recurrent after initial treatment.

b. Residual Functional Capacity

Considering the large number of possible complications from brain tumors, medical judgment must be applied on a case-by-case basis in order to determine the correct RFC. Mental and physical residual impairments must both be considered. For example, if epilepsy is a complication of the tumor, then the RFC considerations under Listing 11.02 would be appropriate. If the tumor was associated with a stroke or produced similar limitations, see the discussion of strokes and RFCs for strokes under Listing 11.04. A mental disorder might require a mental RFC as discussed under the listings dealing with mental orders (CD Part 12).

Sometimes neurosurgeons who have performed brain surgery emphasize the surgical recovery of the patient and may write in a report: "Doing well, with no evidence of recurrent tumor." These general statements do not mean that a claimant lacks nervous system or mental problems. For example, it is not uncommon for a family member to tell the SSA that the claimant had a marked personality change after brain surgery, even though the treating neurosurgeon's records suggest everything is fine. Before denying a claimant with a brain tumor it is important that the SSA has detailed information about the claimant's nervous system and mental condition even if the SSA must pay for the examinations.

18. Listing 113.13: Malignant Brain Tumors (Children)

This child malignant brain tumor listing is the same as Listing 13.13, part Ⓐ1. See comments under that part of the adult listing.

a. Listing Level Severity

Highly malignant tumors, such as grades III and IV astrocytomas, glioblastoma multiforme, ependymoblastoma, medulloblastoma or other primitive neuroectodermal tumors (PNETs) with documented metastases, diffuse intrinsic brain stem gliomas, or primary sarcomas.

19. Listing 13.14: Lung Cancer (Adults)

The SSA sees large numbers of claimants with lung cancer, almost always associated with a history of cigarette smoking. Most frequently, the cancer is squamous cell carcinoma (SCC), also known as epidermoid carcinoma, occurring in the bronchial tubes. There are also significant numbers of adenocarcinomas in claimants with histories of cigarette smoking. These cancers are very dangerous, and a person's best chance of cure is if the cancer is detected early enough to allow complete surgical removal. Once there is distant metastasis of the cancer to other organs the prognosis is grim.

Another, often fatal, form of lung cancer is small cell cancer, also known by the older name of oat cell carcinoma. All lung carcinoma cancers that are not small cell carcinoma are known by the collective name "non-small lung cancer" (NSCLC). The squamous cell cancer discussed above is NSCLC, a commonly used acronym in medical literature and medical records.

The location where lymphatic vessels, arteries, and veins enter each lung is called the hilum. The associated lymph nodes are called hilar lymph nodes and are important markers in determining how far a lung cancer has spread, which influences prognosis and planned treatments. The mediastinum is the large space between the lungs that contains the heart, esophagus, trachea, lymph nodes, and other structures. Spread of lung cancer to lymph nodes in the mediastinum is more distant than the hilar nodes and should be considered unresectable for purposes of part Ⓐ. Mediastinal metastasis is also beyond the hilar lymph nodes, for purposes of part Ⓐ. Of course, distant metastasis qualifies under part Ⓐ, because it implies even further spread than mediastinal cancer. Any recurrent cancer satisfies part Ⓐ. Proof of recurrence could be a biopsy or imaging studies (CT, MRI) compatible with recurrent cancer. The SSA should not second-guess treating physicians. If the treating physicians think the evidence warrants treatment for recurrence but the facts are unclear, any benefit of the doubt should go to the claimant.

Small cell carcinoma prognosis remains so poor that diagnosis alone is sufficient to satisfy part Ⓑ of the listing. Nothing else is required.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ or Ⓑ, below.

Ⓐ Non-small-cell carcinoma—inoperable, unresectable, recurrent, or metastatic disease to or beyond the hilar nodes.
Ⓑ Small-cell (oat cell) carcinoma.

b. Residual Functional Capacity

People with lung cancer frequently have lung disease, especially emphysema and chronic bronchitis associated with cigarette smoking. The limiting effects of such disease must be taken into consideration even if the claimant is not allowed benefits on the basis of cancer. Also, breathing capacity is diminished in some degree when parts of a lung are removed (lobectomy), significantly so when an entire lung is removed (pneumonectomy). If not an allowance under the listings dealing with breathing impairment, the residual functional capacity (RFC) should always include restrictions against exposure to excessive dust and fumes when lung disease is present. The SSA should always evaluate breathing capacity with appropriate pulmonary function tests when lung disease other than cancer is present, if the cancer listing is not satisfied. Some such claimants could meet a breathing disorder listing or might be a medical-vocational allowance under one of those listings, even though their cancer doesn't qualify under this listing for cancer. (See CD Part 3 for a discussion of breathing disorders.)

20. Listing 13.15: Cancer of the Pleura or Mediastinum (Adults)

The pleura is a moist membrane that covers the outside of the lungs and the inside of the chest cavity. The mediastinum is the large space between the lungs that contains the heart, esophagus, trachea, lymph nodes, and other structures.

A mesothelioma is a tumor originating in the pleura and may be either benign or cancerous. Excessive exposure to asbestos is a known cause of malignant mesothelioma.

Because of the structures in the mediastinum, a large number of possible cancers can affect this area. Some examples include lung cancer, malignant mesothelioma, lymphoma, endocrine tumors, sarcomas, esophageal cancers, neurogenic tumors arising from nerve tissue, seminomas, and others. All of these cancers vary in treatment and prognosis. Note than in part Ⓑ1 any spread of the cancer, even to the nearest (regional) lymph nodes is automatically an allowance. Part Ⓑ2 is satisfied by any recurrence of any severity, anywhere in the body.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match part Ⓐ or Ⓑ, below.
Ⓐ Malignant mesothelioma of pleura.
Ⓑ Tumors of the mediastinum, as described in 1 or 2:
1. With metastases to or beyond the regional lymph nodes.
2. Persistent or recurrent following initial anticancer therapy.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. When a pleural cancer is involved, surgical resection of part of the chest wall may result in a breathing impairment that needs additional evaluation. (See CD Part 3 for a discussion of breathing disorders.)

21. Listing 13.16: Cancer of the Esophagus or Stomach (Adults)

About 90% of esophageal cancer cases are squamous cell carcinoma (SCC) associated with exposure to alcohol and swallowed juices from tobacco products. Metastasis has often occurred by the time the cancer is diagnosed, so that about half the cases are already incurable by the time treatment can even start. There are also sarcomas that arise from muscles within the esophagus, and this cancer also has poor survival rates.

Over 90% of stomach (gastric) cancers are adenocarcinomas. The prognosis for survival is grim. At five years after diagnosis many patients will be dead, because most are not diagnosed early in the development of cancer. The lucky patients are those who receive an early diagnosis and total surgical removal of the cancer before it can spread; most will be alive five years after diagnosis. Surgery is the only curative treatment, and to be cured, must occur before the cancer can spread out of the stomach.

Like esophageal cancer, exposure of the stomach to tobacco products is a risk factor for developing adenocarcinoma. Sarcomas can arise from the muscles of the stomach, but such cancers are rare compared to adenocarcinoma. Sarcomas of the stomach are dangerous cancers. As with stomach carcinomas, the only real hope for cure is early detection, before the malignancy can leave the stomach. After the sarcoma metastasizes, control becomes much less likely.

Note that regarding part Ⓐ, it doesn't matter how advanced the cancer is or how apparently successful the treatment—the presence of esophageal cancer is still an automatic allowance. Part Ⓑ1 is satisfied if stomach cancer was not completely removed with surgery, if it grows into any surrounding organs (like the pancreas), or recurs anywhere in the body in any degree of severity. Part Ⓑ2 is satisfied by metastasis to any lymph nodes, even those nearest the cancer.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must satisfy Ⓐ or Ⓑ, below.

Ⓐ Carcinoma or sarcoma of the esophagus.

Ⓑ Carcinoma of the stomach, as described in 1 or 2:

1. Inoperable, unresectable, extending to surrounding structures, or recurrent.
2. With metastases to or beyond the regional lymph nodes.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. Cancer in general can result in nutritional problems, but extensive surgery on the esophagus, stomach, or surrounding structures may result in more difficulties in maintaining normal body weight. This fact could influence the residual functional capacity or even result in allowance under the digestive system listings if the weight loss is sufficiently great (see CD Part 5).

22. Listing 13.17: Cancer of the Small Intestine (Adults)

While cancer of the colon is a major killer of adults, cancer of the small intestine is rare. About half of small intestinal cancers are adenocarcinomas, but sarcomas can arise from the muscles in the intestinal wall. Other possible cancers of the small intestine are lymphomas and carcinoid. In general, small intestinal cancers produce symptoms of abdominal pain, nausea, and vomiting. Carcinoid is the cause of about a third of small intestinal cancers and can produce chemicals like serotonin that result in more symptoms. Serotonin can cause what is called the carcinoid syndrome, with flushing of the skin and diarrhea. Carcinoid can also produce a number of other hormones and can arise in locations other than the small intestine.

a. Listing Level Severity

For your condition to be severe enough to meet the listing, it must match Ⓐ or Ⓑ, below.

Ⓐ Carcinoma, sarcoma, or carcinoid.

Ⓑ With metastases beyond the regional lymph nodes.

b. Residual Functional Capacity

The comments about RFC under Listing 13.16 apply here.

23. Listing 13.18: Cancer of the Large Intestine (Carcinoma or Sarcoma) (Adults)

Cancer of the large intestine in middle-aged and older adults is a major cause of cancer deaths. High-fat, low-fiber food with inadequate consumption of fruits and vegetables are risk factors for developing colon cancer of the adenocarcinoma type. Recently, evidence has added cigarette smoking as a risk factor. Symptoms of abdominal pain, rectal bleeding, or constipation may be present. The large intestine includes the rectum when considering this listing.

Over 90% of colon cancers are of the adenocarcinoma type and at least 10% have metastasized at the time of diagnosis. Like other cancers, the probability of being able to survive adenocarcinoma of the colon depends on whether it has spread. If the cancer is detected early, before any metastasis to even regional lymph nodes, then the five-year survival rate is about 95%. However, if the cancer has spread to distant sites, such as the liver, then five-year survival rates fall drastically. Long-term survival depends on the degree

of malignancy of the individual cancer, as well as its location in the large intestine.

The listing also mentions sarcomas of the large intestine, but they are very rare. If a sarcoma is present, it is a dangerous tumor and has the same listing requirements.

a. Listing Level Severity

For your condition to be severe enough to meet the listing, it must satisfy Ⓐ, Ⓑ, or Ⓒ, below.

Ⓐ Adenocarcinoma that is inoperable, unresectable, or recurrent.

Ⓑ Squamous cell carcinoma of the anus, recurrent after surgery.

Ⓒ With metastases beyond the regional lymph nodes.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. Because of the location of their colon cancer, some claimants have a permanent colostomy placed for removal of their intestinal bodily wastes. The SSA does not see the presence of a properly functioning colostomy as a problem that would limit exertional or other abilities. It is not unusual for a claimant with colon cancer that is completely removed surgically to recover well and have no functional limitations.

24. Listing 13.19: Cancer of the Liver or Gallbladder (Adults)

Primary malignant tumors of the liver are those that arise in the liver. About 90% of these cancers are hepatocellular carcinomas, which are associated with a dismal long-term survival rate even if they haven't obviously metastasized at the time of diagnosis. The liver is also an organ at high risk for receiving metastatic cancer cells from primary tumors arising in other locations, such as the colon, pancreas, kidney, breast, stomach, lung, and ovary (part Ⓐ). In these instances, evaluation is done under the appropriate listing for the primary tumor.

Carcinoma arising in the gallbladder or bile ducts is also uncommon. The gallbladder stores bile manufactured in the liver. The bile ducts carry bile from the gallbladder and from the liver to the small intestine. These carcinomas are extremely dangerous, with poor survival rates.

a. Listing Level Severity

The listing is satisfied by any type of cancer arising in the liver, gallbladder, or bile ducts.

b. Residual Functional Capacity

RFC has little relevance to this listing, since the presence of any of the listed cancers results in allowance of benefits, without consideration of other factors like response to treatment.

25. Listing 13.20: Cancer of the Pancreas (Adults)

Pancreatic cancer is of the carcinoma type, usually adenocarcinoma. Many cases are inoperable for cure at the time of diagnosis and most patients die within one year. Therefore, part Ⓐ is automatically satisfied by the diagnosis of pancreatic carcinoma. The one exception is islet cell carcinoma, which arises in the cells that normally produce the hormones insulin and glucagon, which must be evaluated under part Ⓑ.

One type of islet cell carcinoma is known as an insulinoma, because it produces abnormal amounts of the hormone insulin. However, most insulinomas are not cancerous; those that are malignant should be considered under part Ⓑ. Islet cell carcinomas may also produce a number of active hormones other than insulin.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ or Ⓑ below.

Ⓐ Pancreatic carcinoma (except islet cell carcinoma).

Ⓑ Pancreatic islet cell carcinoma that is inoperable or unresectable, and that produces some type of active hormone.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. Some cases of pancreatic islet cell carcinoma that don't secrete active hormones might be associated with residual problems after surgery on the pancreas to remove the cancer.

For example, diabetes might result from removal of pancreatic tissue, and there could also be problems with digestion if sufficient pancreatic enzymes do not remain. See CD Part 5 regarding digestive disorders and CD Part 9 regarding diabetes. In fact, one of these listings might be met even if the criteria of the above cancer listing are not satisfied.

26. Listing 13.21: Carcinoma of the Kidneys, Adrenal Glands, or Ureters (Adults)

One adrenal gland is located on top of each kidney. The ureter is a tube that carries urine from a kidney to the bladder. Carcinomas arising from these organs create a poor prognosis for survival if they are not surgically removed before they have metastasized.

In regard to part Ⓐ, the meaning is that the surgery cannot be done (inoperable), there was less than complete removal of the cancer (unresectable), or that the cancer returns after apparent complete cure (recurrent).

Part Ⓑ is satisfied if cancer arising from one of the organs mentioned by the listing spreads even to the nearest lymph node.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ or Ⓑ, below.

Ⓐ Inoperable, unresectable, or recurrent.

Ⓑ With metastases to or beyond the regional lymph nodes.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. Most kidney cancers arise on one kidney. Even if that one kidney is completely removed the other kidney could function well enough for both—if the remaining kidney is healthy. If not, evaluation would have to be done under the listings for kidney disease in CD Part 6. Similarly, complete removal of one adrenal gland for cancer would probably not result in significant functional limitations. However, it is possible for cancer to occur in both adrenal glands. If both glands were removed, consideration would have to be given to how well you do with replacement of the hormones lost by removal of the adrenal glands.

27. Listing 113.21: Neuroblastoma (Children)

Neuroblastoma is one of the most common cancers of infancy. It is caused by chromosomal abnormalities involving a part of the nervous system. The most frequent organs affected are the adrenal glands. The prognosis is better if the child is less than one year of age at the time of onset.

28. Listing 13.22: Carcinoma of the Urinary Bladder (Adults)

The urinary bladder stores urine received by a means of a ureter from each kidney. The bladder discharges urine from the body through the urethra. Most urinary bladder cancers are transitional cell carcinomas. Like other cancers, bladder carcinomas have a much better prognosis if detected early, before they have spread beyond the bladder. Even metastasis to regional lymph nodes results in a poorer chance for survival, so it is an allowance (part Ⓓ). Failure to achieve complete surgical removal of the cancer for any reason satisfies part Ⓒ.

Total cystectomy (part Ⓑ) means complete removal of the bladder. When cystectomy is necessary, the ureters can be sewed into the last part of the small intestine as a drainage site for urine. Any infections or other complications affecting kidney function as a result of such urinary diversion must be evaluated under Listing 6.02 (CD Part 6), which deals with decreased kidney function (part E).

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ, Ⓑ, Ⓒ, or Ⓓ, below.

Ⓐ With infiltration beyond the bladder wall.

Ⓑ Recurrent after total cystectomy.

Ⓒ Inoperable or unresectable.

Ⓓ With metastases to or beyond the regional lymph nodes.

b. Residual Functional Capacity

RFC has little relevance to this listing, since this listing is met when the cancer is advanced enough to cause any significant symptoms or other complications.

29. Listing 13.23: Cancers of the Female Genital Tract (Adults)

This listing is long because the SSA has taken all previous listings dealing with specific kinds of female genital tract cancer and combined them into one listing. It is still easy to follow if broken up into its main parts. Note that in parts Ⓐ through Ⓓ, the listing refers to "persistent or recurrent" cancer. Any amount of persistence or any amount of recurrence in any location satisfies the listing. Recurrence fulfilling the listing does not depend on apparent or predicted responses to treatment by anyone—the SSA's or your treating doctors. If you have recurrence, you are an allowance. It is best to have a biopsy proving a recurrence of cancer, but imaging—such as an MRI or CT scan—showing recurrence is certainly satisfactory. In uncertain cases where imaging results are not clear, the SSA should give you the benefit of the doubt: If your treating doctors give you therapy for recurrence, the SSA should accept that decision.

Several parts of the listing refer to the "serosa." The serosa is the moist, thin membrane covering these organs. If cancer breaks through the serosa, other pelvic or abdominal organs can be exposed to malignant cells.

Corpus and Cervix of Uterus. The corpus is the main body of the uterus. The cervix is the lower portion of the uterus, extending into the vagina, and it is the portion of the uterus on which PAP smears are done. Uterine cancer may be carcinomas or sarcomas. Squamous cell carcinomas (SCC) are the most common type of uterine cancer and arise from the cervix. Adenocarcinomas arise from the cells lining the inside of the body of the uterus. Sarcomas are very rare tumors that arise from uterine muscle and exist as a number of specific forms such as leiomyosarcomas and fibrosarcomas.

The prognosis of all uterine cancers is good if the cancer is detected very early. The earliest cervical cancers that are still confined to their cell layer of origin (in situ cancers) may require no more than laser surgery or cryotherapy. The SSA sees in situ cervical cancers fairly frequently and these cancers cannot qualify under any cancer listing. Those slightly more advanced but still confined to the cervix may be cured with a hysterectomy.

Regardless of the type of uterine cancer, once it has spread through the lymphatic or blood system or has grown outside of the uterus by direct extension, the probability of long-term survival decreases significantly. Prognosis depends on the specific type of cancer, degree of malignancy of the particular cancer's cells, what other organs are involved, and how far the cancer has spread. Surgery, radiation, and chemotherapy may all play a role in the treatment of uterine cancer.

Total pelvic exenteration is extremely extensive surgery. It involves removal of pelvic organs—the uterus, ovaries, bladder, rectum, and lymph nodes. Fortunately, this surgery is rarely seen anymore.

Vulva. The vulva are the external female genitalia. Vulvar carcinoma is uncommon, making up only about 3–4% of female genital cancers. Most cancers of the vulva are squamous cell carcinomas (SCC), accounting for about 90% of cases. If the cancer is so early that it is in situ cancer, a complete cure can be achieved by a wide excision around the cancer with skin grafting. Other treatments for in situ carcinoma include lasers, cryosurgery, and topical drugs. In situ cancer is Stage 0.

Vulvar carcinomas of Stage I or more require radical surgical removal of the vulva. The majority of patients with Stage I vulvar carcinoma will survive five years, while most with advanced (Stage IV) cancers will be dead within five years.

The inguinal lymph nodes in the groin, the area of the crease where the thigh meets the abdomen, are the regional lymph nodes of concern. Spread of cancer beyond these nodes is considered distant metastasis.

Fallopian Tubes. The right and left fallopian tubes carry eggs from the ovaries to the uterus. Like any other living tissue, the fallopian tubes can give rise to cancer. Fallopian tube cancers can be carcinomas or sarcomas. These cancers can be cured if the cancer is carcinoma in situ (Stage 0). Surgery would then remove all of the cancer. Unfortunately, as with other cancers, in situ cancer is not likely to produce symptoms, and so detection at that stage only occurs incidentally to investigation of some other medical problem.

Even carcinomas apparently confined to the fallopian tube at diagnosis (Stage I) result in only

about a 60% five-year survival rate. The reason for this is probably that cancerous cells leak from the fallopian tube into the abdominal cavity, where they can implant on the peritoneal membrane lining the abdominal cavity or other organs such as the liver or outer surfaces of the intestines. The most advanced disease spreads outside of the abdomen and these patients have little chance for survival for an extended period of time. Most fallopian tube cancers are carcinomas and they make up only a smaller percentage of cancers arising in the female reproductive organs. Sarcomas of the fallopian tubes are extremely rare cancers.

Ovarian Cancer. This listing applies to all cancer of the ovaries, including recurrent cancer. Most ovarian cancers are of the carcinoma type, such as cystadenocarcinomas and undifferentiated carcinomas. There are also many other possible ovarian cancers, such as choriocarcinomas, embryonal cell carcinomas, dysgerminomas, and teratomas. This latter group of cancers are collectively known as germ cell tumors, because of the type of reproductive tissue from which they arise. Part Ⓔ2 deals with germ cell cancers. If there is any doubt whether you have a germ cell cancer, your treating doctor should be able to easily answer that question for you.

The specific type of ovarian cancer has a lot to do with the prognosis. Choriocarcinomas and malignant teratomas have a particularly poor survival rate. As in other forms of cancer, survival is directly related to how early the cancer can be detected and treated. The chance for long-term survival is much better if the cancer is confined to the ovary and has not metastasized to other organs.

Cystadenocarcinomas may result in a fluid build-up in the abdomen that contains cancerous cells. This condition is called malignant ascites. Once cancer cells are floating around in the abdomen, they can implant themselves on other organs such as the liver, the peritoneal membrane lining the abdominal cavity, or the omentum. The omentum is a sheet of peritoneal membrane between the stomach and other abdominal organs.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ, Ⓑ, Ⓒ, Ⓓ, or Ⓔ, below.

Ⓐ Uterus (corpus), as described in 1, 2, or 3:
1. Invading adjoining organs.
2. With metastases to or beyond the regional lymph nodes.
3. Persistent or recurrent following initial anticancer therapy.

Ⓑ Uterine cervix, as described in 1 or 2:
1. Extending to the pelvic wall, lower portion of the vagina, or adjacent or distant organs.
2. Persistent or recurrent following initial anticancer therapy.

Ⓒ Vulva, as described in 1, 2, or 3:
1. Invading adjoining organs.
2. With metastases to or beyond the regional lymph nodes.
3. Persistent or recurrent following initial anticancer therapy.

Ⓓ Fallopian tubes, as described in 1 or 2:
1. Extending to the serosa or beyond.
2. Persistent or recurrent following initial anticancer therapy.

Ⓔ Ovaries, as described in 1 or 2:
1. All tumors except germ cell tumors, with at least one of the following:
   a. Tumor extension beyond the pelvis; for example, tumor implants on peritoneal, omental, or bowel surfaces.
   b. Metastases to or beyond the regional lymph nodes.
   c. Ruptured ovarian capsule, tumor on the serosal surface of the ovary, ascites with malignant cells, or positive peritoneal washings.
   d. Recurrent following initial anticancer therapy.
2. Germ cell tumors—progressive or recurrent following initial anticancer therapy.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. There are far too many possibilities to consider here. If surgery is confined to removal of the uterus and ovaries, there will no functional limitation requiring an RFC. Extensive surgery in the form of total pelvic exenteration would constitute an allowance under the

listing and therefore wouldn't need to be considered under an RFC.

Radiotherapy given to kill cancer cells may also damage the intestine, resulting in additional pain and nutritional problems. Those cases should be evaluated under the digestive system listings (CD Part 5), as well as the RFC considerations discussed in relation to digestive problems. Other complications can include infection, nerve damage, edema in the legs, incontinence, and persistent bladder inflammation (chronic cystitis). These complications are particularly likely to cause chronic pain and limit the amount of time that a person can spend standing and walking. The kidney and liver can also be damaged by radiation. Claimants receiving radiation therapy would probably meet the listing without the need to consider the complications of radiation. But after three years with no evidence of cancer, a claimant would no longer meet the listing and could still be suffering complications from treatment that would require an RFC.

30. Listing 13.24: Carcinoma of the Prostate Gland (Adults)

Adenocarcinoma of the prostate gland is a significant killer of men. Early diagnosis is the key to long-term survival. Prostate cancer is common: A large percentage of elderly men have microscopic cancer in their prostate gland found incidentally at autopsy, but they died of something else first.

Prostate specific antigen (PSA) is a useful test for prostate carcinoma and to monitor recurrence. PSA is measured by a blood test as a possible marker for adenocarcinoma cancer of the prostate gland. Normal levels are 0–4 nanograms/milliliter (ng/ml). PSA cannot be used to diagnose prostate cancer; that can only be done reliably by biopsy. However, values greater than 10 ng/ml should be considered definitely abnormal and the cause investigated. Like other medical tests, appropriate interpretation of PSA requires considerable medical judgment regarding individual patients, especially when there are borderline values in the 4–10 ng/ml range. *Change* in PSA values over time is especially significant. Some noncancerous conditions, such as the commonly occurring enlargement of the prostate known as benign prostatic hypertrophy (BPH), can also raise PSA levels. However, with widespread metastatic prostate cancer involving multiple tumors in bones, a much higher PSA is to be expected than would be seen in noncancerous conditions. The SSA can purchase a PSA test to help in the determination of whether your prostate cancer is controlled, but informed medical judgment is required to interpret the results. Because the listing deals with a question of control by treatment, PSA levels done before and after surgery can be important in deciding that question.

Another important diagnostic tool is high-frequency sound (ultrasound) imaging of the prostate gland through the rectum. The prostate gland lies up against the rectum, so that transrectal ultrasound (TRUS) is a valuable test. TRUS is not sufficient for a definitive diagnosis; only biopsy of the prostate can accomplish that purpose. For TRUS, a transducer probe must be inserted into the rectum. The SSA cannot purchase either TRUS or a biopsy, so if these tests were done, they must be obtainable from your medical records.

Since prostate carcinoma is stimulated to grow by the presence of the male sex hormone testosterone, treatment is directed toward lowering testosterone levels. Suppression of testosterone is accomplished by drugs or by removal of the testes (orchiectomy). Because prostate carcinoma is a hormone-dependent tumor, control may be achieved even if the cancer has metastasized. Prostate cancer frequently spreads to bone. If treatment has just started, the SSA should wait a reasonable amount of time to obtain enough information to make a reasonable judgment about whether the cancer will respond to prescribed therapy. This usually requires waiting at least three months from the beginning of treatment. In fact, treating doctor records are often not very helpful regarding response to treatment until at least six months have passed. Then a much clearer picture can be obtained. Considerable medical judgment is required to evaluate a claimant's response to prescribed therapy for prostate cancer.

A variety of surgical techniques are available to destroy early, small prostate cancers without radical surgery. Radical prostatectomy carries the risk of impotence. In applying this listing, note that the

listing says nothing about the amount of cancer ("tumor burden"), such as the size of tumors, their location, or the number of tumors.

In regard to part Ⓐ, progression is present if there are any new cancers, such as even one new bone lesion. Also, recurrence means any amount of cancer recurring anywhere in the body.

Part Ⓑ refers to "visceral metastases," which means spread to other soft internal organs, such as the liver, lungs, intestine, or brain. A biopsy is not necessary to prove metastases—imaging such as MRI or CT is sufficient.

Finally, if your treating doctor believes that you will respond well to further treatment for progression or recurrence, this does not disqualify you under either part Ⓐ or part Ⓑ of the listing. In uncertain cases of progression, metastasis, or recurrence, the SSA should give you the benefit of the doubt if your own doctors actually treat you for such cancer.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ or Ⓑ, below.

Ⓐ Progressive or recurrent prostate cancer despite initial hormonal intervention.

Ⓑ Prostate cancer with visceral metastases.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and treatment given. Impotence has no relevance to a claimant's ability to work and is therefore not considered on a residual functional capacity (RFC) assessment. Pain from bone lesions and side effects from treatment medication may produce functional limitations, but these cases would almost certainly qualify under the listing. An interesting, but medically uninvestigated area, is whether male sex hormone suppression (a standard part of prostate cancer treatment) results in decreased muscular strength.

31. Listing 13.25: Testicular Cancer (Adults)

Choriocarcinoma of the testes (part Ⓐ) is an unusual, but dangerous cancer with a poor prognosis. Choriocarcinoma is known as a type of germ cell tumor. Germ cell tumors are so named because they arise from primitive reproductive cells, which are those of the type that produce eggs (ova) in females or spermatozoa in males. Other possible germ cell testicular cancers include seminomas, embryonal cell carcinomas, teratomas, and what are called yolk sac tumors. There are also nongerm cell testicular tumors such as gonadoblastomas, Leydig cell tumors, carcinoid, and adenocarcinomas, although they are rare.

Seminomas are the most common testicular tumor and can often be treated effectively—early stages of the cancer have at least a 95% five-year survival in numerous studies. A majority with more advanced stages of seminoma can be helped with chemotherapy. Removal of the affected testis (orchiectomy) is necessary to eliminate the primary tumor, regardless of its type. Because castration is a basic part of treatment, there is nowhere for the original primary tumor to recur. Therefore, the listing deals only with progressive or recurrent metastatic disease that escaped the diseased testicle prior to its removal.

a. Listing Level Severity

Progressive or recurrent metastatic testicular cancer after initial anticancer treatment.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. Removal of the testes does not produce work-related functional limitations and would not warrant an RFC. Metastic involvement of other organs would require evaluation under the appropriate listings. For example, spread to the brain would lead to consideration of the neurological listings (CD Part 11) and the mental listings (CD Part 12), as well as any related RFC limitations.

32. Listing 13.26: Carcinoma of the Penis (Adults)

The great majority of penis cancers are squamous cell carcinomas (SCC) and are rare malignancies in the United States. Other less common penile cancers include melanomas, basal cell carcinomas,

and Kaposi's sarcoma, as well as involvement of the penis with lymphoma or infiltrates of leukemic cells. However, this listing specifically refers to carcinoma only. In countries where personal hygiene is poor and circumcision uncommon, penile carcinoma accounts for a much higher percentage of male cancers. Most penile cancer occurs in men over age 50. Because these cancers are painless, many men delay going to a doctor for over a year after a visible cancer appears.

Treatment with radiation may be highly effective for localized cancers. The advantage of radiation is that it can leave the penis more functional. Advanced cancers, or those in which radiation has failed, require surgical control with partial or total removal of the penis. Chemotherapy has been of benefit in some cases with inoperable cancer of the penis.

The inguinal lymph nodes in the groin, the area of the crease where the thigh meets the abdomen, are the regional lymph nodes of concern. Cancer in these nodes and especially metastasis beyond the inguinal nodes decreases survivability.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, you must have carcinoma of the penis with metastases to the regional lymph nodes or beyond.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. However, penile carcinoma meets the listing if it even spreads to the nearby lymph nodes, so if it doesn't meet the listing it is unlikely to be associated with a significant work-related impairment that would require an RFC.

33. Listing 13.27: Metastatic Cancer—Primary Site Unknown (Adults)

It is not uncommon for the first evidence of cancer to be detection of a metastatic tumor. The cells of a metastatic tumor often look like their tissue of origin. For example, a cancerous nodule in the lung from a colon tumor will have malignant cells that can be identified as colon cells. Armed with this knowledge, doctors know what kind of cancer they are dealing with and can usually find the primary tumor.

Sometimes a metastatic tumor is found, but microscopic evaluation of the cells does not reveal their tissue of origin. In these cases, finding the primary tumor is more difficult and may not be successful. Since this situation amounts to failed treatment, it is only reasonable that such cases be allowed.

a. Listing Level Severity

For your condition to be severe enough to meet this listing, you must have metastatic carcinoma or sarcoma, and your doctors must be unable to find the primary tumor of origin after an appropriate search. The one exception that does not qualify is a single squamous cell carcinoma tumor in the neck, which should be evaluated under Listing 13.02.

b. Residual Functional Capacity

Because the Listing could apply to metastatic cancer anywhere in the body, in single or multiple locations, it is impossible to make specific RFC recommendations. If at some point in time the Listing is no longer satisfied, evaluation of RFC would have to consider the type of remaining impairment, if any. In that event, reference should be made to whatever Listing and associated RFC is appropriate.

34. Listing 13.28: Cancer Treated With Transplant (Adults)

Cancerous involvement of bone marrow can sometimes be cured with stem cell or bone marrow transplantation. Bone marrow stem cells are the basic cells that serve as an origin for the various types of marrow cells; they can evolve into more than one type of cell and are responsible for the constant replenishing of marrow cells that is required for ongoing life. Abnormal stem cells that give rise to cancerous cells in marrow must be replaced by healthy stem cells, if there is to be a cure. Myeloma, lymphoma, and leukemia are most likely to be treated with tranplanted marrow or stem cells, but there are also other cancers that might respond. (Ironically, myeloma has been caused in some patients who were given marrow transplants to treat other forms of cancer, but this is unusual.)

a. Listing Level Severity

For your condition to be severe enough to meet this listing, it must match Ⓐ or Ⓑ, below.

Ⓐ Allogeneic transplant. Consider under a disability for 12 months following the transplant. Then evaluate any residual medical problems.

Ⓑ Autologous transplant. Consider under a disability for 12 months following the first cancer treatment under a plan that includes an eventual transplant. Then evaluate any residual medical problems.

Under part Ⓐ, benefits are automatically given for 12 months after the actual date of transplant. Under part Ⓑ, which involves a transplant of one's own cells or cells from an identical twin, your 12 months of automatic benefits starts before the date of actual transplantation and so may end sooner than 12 months after the date of transplant. In other words, part Ⓑ gives less time for recovery after the transplant, because there are less likely to be complications when receiving identical cells.

b. Residual Functional Capacity

Medical judgment must be applied to individual cases, taking into account residual impairment from both the cancer and the treatment given. Numerous potential problems can arise from the use of the immune-system suppressing drugs intended to prevent the recipient's body from rejecting the transplanted tissue. These must be evaluated on a case by case basis. Another possible complication of any type of transplant is graft versus host disease (GVHD), in which the transplanted tissue tries to reject the recipient's tissues. (This is a reversal of the usual rejection problem of the recipient's body trying to reject the transplant.) ■