



Summary of September 2006 ICD-9-CM Coordination and Maintenance Committee Meeting

The ICD-9-CM Coordination and Maintenance Committee, cosponsored by the National Center for Health Statistics (NCHS) and the Centers for Medicare and Medicaid Services (CMS), met on September 28-29, 2006 in Baltimore, MD. Donna Pickett, RHIA, from NCHS, and Patricia Brooks, RHIA, from CMS, cochaired the meeting.

Proposed modifications to ICD-9-CM were presented and are summarized below. This summary does not include all of the details of the code proposals or all of the recommendations made at the meeting. For complete details, review the minutes and code proposals posted on the CMS and NCHS websites. Diagnosis code proposals and the minutes from the diagnosis portion of the meeting are posted on the NCHS website and can be accessed at the following link:

www.cdc.gov/nchs/about/otheract/icd9/maint/maint.htm. Procedure code proposals and the minutes from the procedure portion of the meeting can be found at the CMS website and can be accessed at the following link:

http://www.cms.hhs.gov/ICD9ProviderDiagnosticCodes/03_meetings.asp. **The deadline for submitting comments is 12/4/06 on both the diagnosis and procedure proposals.**

Comments on procedure code proposals should be submitted to CMS and comments on diagnosis code proposals should be submitted to NCHS (addresses are given below).

None of the proposals discussed at the October meeting will go into effect April 1, 2007. If approved by CMS and NCHS, these revisions will go into effect with discharges on or after October 1, 2007.

Suggestions for procedure code proposals to be considered at a future Coordination and Maintenance Committee, as well as comments on procedure proposals presented at the September meeting, may be emailed to Pat Brooks at Patricia.brooks2@cms.hhs.gov or mailed to: Centers for Medicare & Medicaid Services, CMM, HAPG, Division of Acute Care, Mail Stop C4-08-06, 7500 Security Boulevard, Baltimore, Maryland 21244-1850.

Suggestions for diagnosis code proposals for consideration at a future Coordination and Maintenance Committee, as well as comments on diagnosis proposals presented at the September meeting, may be emailed to Donna Pickett at dfp4@cdc.gov or mailed to: Donna Pickett, National Center for Health Statistics, 3311 Toledo Road, room 2402, Hyattsville, Maryland 20782.

The next meeting of the ICD-9-CM Coordination and Maintenance Committee is scheduled for March 22-23, 2007 and will be held at the CMS building in Baltimore, MD. New proposals for inclusion on this agenda must be received by **January 22, 2007**.

Diagnoses

Hearing Loss, Speech, Language, and Swallowing Disorders

The American Speech-Language-Hearing Association recommended new and revised codes for various types of hearing loss and also several new codes for dysphagia.

The proposed modifications to category 389, Hearing loss, build on new codes implemented October 1, 2006 for sensorineural hearing loss. Proposed changes would allow identification of laterality for conductive, sensorineural, and mixed hearing loss. A new code for speech and language developmental delay due to hearing loss has been proposed in subcategory 315.3, Developmental speech or language disorder. It was also proposed that the title of code 389.7, Deaf mutism, not elsewhere classifiable, be changed to “deaf, nonspeaking, not elsewhere classifiable, as “deaf mutism” is an inaccurate and archaic term.

A new code in subcategory 349.8, Other specified disorders of the nervous system, has been proposed for acquired auditory processing disorder. Auditory processing disorder refers to difficulties in the processing of auditory frequency, intensity, and temporal information in the central nervous system. Central auditory processing disorder is indexed to code 315.32, Mixed receptive-expressive language disorder, which is in category 315, Specific delays in development. However, auditory processing disorder can also be acquired through neurological problems caused by tumors, head injury, surgical complications, stroke or degenerative neurological conditions, bacterial or viral infections, or oxygen deficiency.

A new code for dual sensory impairment has been proposed in subcategory V49.8, Other specified conditions influencing health status. Dual sensory impairment is also known as deaf-blindness or multi-sensory impairment. An individual with both visual and hearing impairment can use neither their sight nor hearing to compensate for the impairment of the other sense and neither sense can be used as a primary source for accessing information. A commenter suggested that the code description should be specified as combined visual and hearing disorders, as dual sensory impairment could be interpreted to include senses other than sight and hearing. A question was raised as to whether the V code chapter is the most appropriate location for dual sensory impairment.

A new code in subcategory V72.1, Examination of ears and hearing, has been proposed for encounter for hearing conservation testing and treatment. Hearing conservation involves hearing loss monitoring, employee education, acoustic analysis of noise risks, and prevention (hearing protection). The US Department of Defense has a major hearing conservation mission. Hearing conservation is also required by the Occupational Safety and Health Administration for employees exposed to hazardous levels of noise.

An expansion of code 787.2, Dysphagia, has been proposed to identify each phase of dysphagia (oral, oropharyngeal, pharyngeal, and pharyngoesophageal). Dysphagia is a dynamic disorder, and the symptoms vary significantly depending on the phase(s) of the swallow that is affected. The presenter suggested an additional code for “combined type.” Commenters expressed concern as to whether the physician would typically document the specific phase of the dysphagia. It was also noted that consideration should be given as to the impact of this proposal on code 438.82, Other late effects of cerebrovascular disease, Dysphagia, since no corresponding changes have been proposed for this code.

An expansion of code V70.4, Examination for medicolegal purposes, has been proposed in order to create a unique code for disability examination. It was suggested that code V70.3, Other medical examination for administrative purposes, V70.8, Other specified general medical examinations, or V68.0, Issue of medical certificates, might be a more appropriate location for this new code.

Urinary Risk Factors for Bladder Cancer

It has been requested that a note instructing the use of an additional code, if applicable, to identify any risk factors for bladder cancer be added under code 599.7, Hematuria. Examples of risk factors that can already be coded in ICD-9-CM include functional disorder of bladder, history of tobacco use, personal history of urinary tract infection, and tobacco dependence.

Code modifications were proposed to capture certain risk factors for bladder cancer that do not currently have unique ICD-9-CM codes. A new code for exposure to potentially hazardous chemicals has been proposed in subcategory V15.8, Other specified personal history presenting hazards to health. A new code in subcategory V16.5, Family history of malignant neoplasm, Urinary organs, has been proposed for family history of malignant neoplasm of bladder. A revision of code V15.86, Exposure to lead, has been proposed so that this code would encompass other potentially hazardous metals in addition to lead. Commenters suggested that a new code be created for exposure to other potentially hazardous metals rather than revising code V15.86, as the proposed revision would significantly alter the meaning and use of this code.

Participants expressed concern about identifying specific codes in ICD-9-CM as risk factors for a given condition. It was noted that the presence of a clinical condition or a personal or family history can already be coded without a specific “use additional code” note and that it is the responsibility of the clinician, not ICD-9-CM, to identify a condition or personal or family history as a risk factor for bladder cancer.

It was suggested that consideration be given to the creation of separate codes for gross and microscopic hematuria in order to distinguish these clinical situations.

Chronic Total Occlusion of Artery of Extremities

New codes for chronic total arterial occlusion of the extremities have been proposed. Two options were presented. In the first option, one new code for chronic total arterial occlusion of the extremities would be created and there would be an instructional note indicating that atherosclerosis should be coded first. In the second option, a new subcategory would be created in category 440, Atherosclerosis, and specific codes would be created in this subcategory for chronic total occlusion of native artery of the extremities with intermittent claudication, rest pain, ulceration, and gangrene (to correspond with the current codes in subcategory 440.2, Atherosclerosis of native arteries of the extremities). In the interest of code preservation, given that it is unknown how long ICD-9-CM will continue to need to be maintained (until ICD-10-CM is implemented), the participants seemed to favor the first option.

It was suggested that the code structure for chronic total arterial occlusion of the extremities parallel that for chronic total occlusion of coronary arteries, which was presented at the March 2006 Coordination and Maintenance Committee meeting. A question was raised as to the default if a total occlusion is not documented as acute or chronic. The participants felt that chronic would be the logical default for both coronary and peripheral occlusions, with an acute occlusion for a coronary artery generally involving a myocardial infarction.

Chronic total occlusion of an artery in the extremities generally develops over a long time period, with partial occlusion present initially. A chronic total occlusion is typically composed of a hard fibrotic proximal cap, which may be calcified. This is followed by a segment of poorly organized fibrous and calcified plaque, ending with a firm distal cap. Symptoms may vary, particularly in relation to the significance of collateral blood supply. Treatment with stenting or angioplasty would be significantly more complex and difficult than for cases where there was only a partial occlusion, since the total occlusion is harder to cross. A more acute presentation of a total occlusion of a peripheral artery would usually result in an arterial thrombosis, which would be coded to category 444, Arterial embolism and thrombosis.

Osteonecrosis of Jaw

A new code for osteonecrosis of jaw has been proposed in subcategory 733.4, Aseptic necrosis of bone, Jaw. An Excludes code would indicate that osteoradionecrosis of jaw is classified to code 526.89, Other specified diseases of the jaws. New codes for oral bisphosphonates and intravenous bisphosphonates have been proposed in category E933, Drugs, medicinal and biological substances causing adverse effects in therapeutic use, Primarily systemic agents. Some participants suggested that the two proposed E codes be combined into a single code in order to preserve codes for future use. Others felt that two separate E codes would be valuable in order to differentiate the effects of oral and intravenous drugs.

A possible relationship between osteonecrosis of the jaw and the use of bisphosphonates and other medications is being studied in the oral and maxillofacial surgery patient

population. Osteonecrosis differs from osteoradionecrosis, which is caused by radiation therapy.

Intraoperative Floppy Iris Syndrome

An expansion of code 364.8, Other disorders of iris and ciliary body, has been proposed in order to create a unique code for intraoperative floppy iris syndrome. It was suggested that “intraoperative” be made a non-essential modifier because this condition is not caused by the surgery.

During cataract surgery, the iris is usually dilated using medication. In patients with a history of alpha-blockers, the iris does not stay properly dilated, but instead may flap or billow. This unexpected movement during surgery has the potential to lead to injury to the iris or other complications. This can be an issue even if the patient has discontinued the alpha-blocker as much as five years before the cataract surgery. If this complication is considered, the ophthalmic surgeon can keep the pupil open using stronger dilating medication or using miniature hooks. Patients with urinary retention, particularly that due to benign prostatic hypertrophy, often take alpha-blockers.

Septic Embolism

A new code for septic pulmonary embolism has been proposed in subcategory 415.1, Pulmonary embolism and infarction. Septic pulmonary embolism in pregnancy, childbirth, or the puerperium, and that following abortion or with ectopic or molar pregnancy, would continue to be classified to the obstetrical chapter. A new category for septic arterial embolism has also been proposed. This category would include site-specific codes for brain, extremity, retina, other artery, and unspecified artery. The sites that would be specifically identified are those that are most commonly described in medical literature. The default for septic embolism unspecified as to site would be the proposed code for septic pulmonary embolism because this is the most common site. NCHS chose not to propose expanding category 444, Arterial embolism and thrombosis, to identify septic arterial emboli because the fourth and fifth digits for this category are currently used to identify the site of the embolism. Creation of codes for septic arterial emboli in category 444 would thus result in a mixed axis.

For both the septic pulmonary embolism and septic arterial embolism codes, an instructional note would indicate that the underlying infection should be sequenced first. It was suggested that further consideration be given to whether the septic embolism should be sequenced first, since the underlying cause could be a localized infection. NCHS was also asked to consider how these proposed codes fit with the SIRS and sepsis codes.

A septic pulmonary embolism can originate from a localized infection, such as cellulitis or a dental infection, with the embolic material traveling through the venous system to the heart and then going into the pulmonary arterial system where it lodges in small vessels. Septic pulmonary emboli may cause subsequent lung abscess or necrotizing

pneumonia. A lung abscess involves localized pulmonary infection with necrosis and a cavity at least two centimeters in diameter. Necrotizing pneumonia involves multiple localized pulmonary infections with necrosis and cavities smaller than two centimeters in diameter. Both lung abscess and necrotizing pneumonia would be assigned code 513.0, Abscess of lung.

A septic arterial embolus can originate from an infection in the heart (e.g., endocarditis) or lungs (e.g., lung abscess), and then the embolic material travels through the systemic arterial system to lodge in small vessels potentially anywhere in the body, such as the brain, retina, or digits.

Parvovirus B19

A new code for parvovirus B19 has been proposed in subcategory 079.8, Other specified viral and chlamydial infections. An inclusion term for “erythema infectiosum due to parvovirus B19” has been proposed under code 057.0, Erythema infectiosum[fifth disease].

The only parvovirus causing disease in humans is referred to as human parvovirus or parvovirus B19. Parvovirus B19 is the cause of erythema infectiosum, also known as fifth disease. It can also cause an acute symmetrical polyarthropathy. In some cases, parvovirus B19 can cause a transient aplastic crisis, with temporary failure of red blood cell production. In immunocompromised patients, parvovirus B19 can be associated with a pure red cell aplasia and chronic anemia. In the fetus, parvovirus B19 can lead to hydrops fetalis, congenital anemia, or fetal death in utero.

Avian Influenza (Bird Flu)

A new code has been proposed for avian influenza (bird flu). The term avian influenza generally refers to influenza occurring in birds. Although there have been no cases in the US so far, some experts have suggested that it is possible that migratory birds could spread avian influenza to North America during the next year. The code proposal mirrors a code for avian influenza that the World Health Organization added to ICD-10. A new three-digit code would be created rather than adding a code under category 487, Influenza. This approach is consistent with ICD-10. Also, avian influenza represents a different axis than the codes in category 487.

Myotonic Disorders

An expansion of code 359.2, Myotonic disorders, has been proposed in order to create codes for myotonic muscular dystrophy, myotonia congenita, and myotonic chondrodystrophy. It was suggested that an additional code be created for drug-induced myotonia.

Myotonia involves very slow relaxation of muscle after it contracts. Myotonic muscular dystrophy (Steinart disease) is the second most common muscular dystrophy in North

America and the most common cause of myotonia. Weakness is mild in the first few years. Myotonia is usually not evident until about 5 years of age. Cardiac involvement may be present, usually with heart block rather than cardiomyopathy. Myotonia congenita involves muscle stiffness and myotonia, with muscle hypertrophy. Paramyotonia congenita of von Eulenburg involves myotonia brought on by exposure to cold. Myotonic chondrodystrophy (Schwartz-Jampel disease) involves generalized muscle hypertrophy and weakness, with dysmorphic features and dwarfism.

Cardiac Tamponade

A new code for cardiac tamponade has been proposed in category 423, Other diseases of pericardium. The underlying cause should be coded first.

Cardiac tamponade is due to fluid accumulating in the pericardium, with increased pressure on the heart so that ventricular filling is impaired and cardiac output is decreased. Symptoms can be similar to heart failure or cardiogenic shock, with tachycardia, dyspnea, and orthopnea. Cardiac tamponade is generally accompanied by pulsus paradoxicus, with a marked decrease in the pulse during inspiration. It can be caused by a progressive effusion, which may be due to infection or neoplasm, or follow cardiac surgery. It may also be caused by rupture of the heart, aortic dissection, or penetrating trauma. Treatment involves pericardiocentesis to remove the fluid.

Effects of Harmful Algal Bloom and Toxins

A new E code for environmental exposure to harmful algae and toxins has been proposed in category E928, Other and unspecified environmental and accidental causes. It was suggested that since there are other problems associated with these blooms, other than ingesting fish that have been exposed to these toxins (such as respiratory problems), there may be a need for other codes in addition to code 988.0, Toxic effect of fish and shellfish, eaten as food.

Under certain environmental conditions, microscopic marine algae called *Karenia brevis* (*K. brevis*) grow quickly, creating blooms that can make the ocean appear red or brown. These blooms are sometimes referred to as tides. *K. brevis* produces powerful toxins called brevetoxins, which have killed millions of fish and other marine organisms. In addition to killing fish, brevetoxins can become concentrated in the tissues of shellfish that feed on *K. brevis*. People who eat these shellfish may suffer from neurotoxic shellfish poisoning, a food poisoning that can cause severe gastrointestinal and neurologic symptoms, such as tingling fingers or toes. Studies also suggest that people who swim among brevetoxins or inhale brevetoxins dispersed in the air may experience irritation of the eyes, nose, and throat, tingling of the lips and tongue, as well as coughing, wheezing, and shortness of breath. The effects will generally dissipate once they are removed from the environment.

Secondary Diabetes Mellitus

A new category for diabetes mellitus due to underlying condition has been proposed. This category would mirror category 250, meaning that there would be distinct codes for secondary diabetes with different types of manifestations and additional codes would be assigned to identify the specific manifestations. The fifth digits for category 250 would not be used with the proposed category. Steroid induced diabetes would be indexed to the new category.

One notable problem with the proposal that could cause confusion with code application is that a single category would be intended for both diabetes due to an underlying condition and diabetes due to an adverse effect of a drug. This would mean that the sequencing instructions would vary depending on the underlying cause of the diabetes. If the diabetes is due to an adverse effect of drug, the proposed new codes would be sequenced first. If the diabetes is due to an underlying condition, such as Cushing's syndrome, the underlying condition would be sequenced first. It was noted that an individual wouldn't typically develop secondary diabetes immediately following ingestion of a drug (poisoning or adverse effect), so it would most likely be a late effect.

Participants suggested that the proposed category title be changed from "diabetes mellitus due to underlying condition" to "secondary diabetes mellitus" because there is no "underlying condition" for diabetes due to an adverse effect of drug.

Fetal Medicine

A series of new codes has been proposed for specific types of fetal anomalies; maternal complications from in utero procedure; fetal complications from in utero procedure; maternal in utero procedure status of current pregnancy; newborn affected by in utero procedure; personal history of in utero procedure during pregnancy; personal history of in utero procedure while in utero; and pregnancy with history of in utero procedure during previous pregnancy. The two "personal history" codes are intended to differentiate between a past history of an in utero procedure during the patient's pregnancy and patient who underwent an in utero procedure as a fetus. Some of the proposed codes involved fifth digits that differ from the common set of fifth digits used throughout the Obstetrics chapter, and participants noted that this could be problematic. A comment was raised that the proposed new code for suspected fetal anomalies not found could cause confusion because category 655 includes codes for suspected fetal abnormalities.

Codes from category 655, Known or suspected fetal abnormalities affecting management of mother, have been used to indicate a fetal condition, but these codes do not provide a distinction between care provided to the mother and care provided directly to the fetus. Also, with the increased use of in utero surgery to correct fetal anomalies, it is necessary to be able to track the complications associated with this surgery as well as the long-term consequences.

Antenatal Screening

Revisions to the codes in category V28, Antenatal screening, have been proposed due to medical advances. Since amniocentesis is no longer the state-of-the-art test for detecting chromosomal anomalies in utero, it has been proposed that “by amniocentesis” be deleted from the code description for code V28.0. An inclusion term for “fetal anatomic survey” has been proposed under code V28.3, Screening for malformations using ultrasonics. Inclusion terms for screening for genomic anomalies, screening for proteomics, and screening for risk of pre-term labor have been proposed under code V28.8, Other specified antenatal screening.

Excludes notes are being proposed under subcategory V26.3, Genetic counseling and testing, and category V28, Antenatal screening, to indicate that codes under V26.3 are for a parent and those under V28 are for a fetus.

Personal History of Cervical Dysplasia

A new code for personal history of cervical dysplasia has been proposed under subcategory V13.2, Personal history of other genital system and obstetric disorders. Once a patient has been treated for cervical dysplasia, long-term follow-up care is required to test for recurrence.

Acquired Absence of Cervix/Uterus

New codes have been proposed for acquired absence of uterus with cervix and acquired absence of uterus without cervix. The proposal would place the new codes in subcategory 629.8, Other specified disorders of female genital organs because code V45.77, Acquired absence of genital organs cannot be further expanded. The proposed new codes would be used as a standalone status code or in conjunction with codes V67.01, Follow-up vaginal pap smear, and V 76.47, Special screening for malignant neoplasm of vagina. A question was raised as to the default code for status post hysterectomy when there is no mention of whether the cervix is still present or not.

Women who have had a full hysterectomy no longer need cervical Pap smears, but they do require vaginal smears to test for vaginal malignancies. Women with a cervical stump following a hysterectomy still require cervical Pap smears.

Screening for Human Papillomavirus (HPV) and Sexually Transmitted Diseases

It has been proposed that a new code for screening for human papillomavirus (HPV) be created under subcategory V73.8, Other specified viral and chlamydial diseases. It has also been proposed that the description of code V74.5, Special screening for venereal disease, be modified because the term “sexually transmitted disease” represents more current terminology. An excludes note for special screening for nonbacterial sexually transmitted diseases has been proposed under code V74.5 because category V74 is limited to screening for bacterial and spirochetal diseases.

Vulvar and Vaginal Intraepithelial Neoplasia and Abnormal Cytology of Vagina

New codes for vulvar and vaginal intraepithelial neoplasia have been proposed. Code 233.3, Carcinoma in situ of other and unspecified female genital organs would be expanded to create codes for vaginal intraepithelial neoplasia III and vulvar intraepithelial neoplasia III. Code 624.0, Dystrophy of vulva, would be expanded to create codes for vulvar intraepithelial neoplasia I and vulvar intraepithelial neoplasia II.

Malignant Ascites

An expansion of code 789.5, Ascites, has been proposed to create a code for malignant ascites. An instructional note would indicate that the malignancy should be coded first. Malignant ascites currently defaults to code 197.6, Secondary malignant neoplasm of retroperitoneum and peritoneum. While it is true that malignant ascites may be the result of metastatic spread of a malignancy to the peritoneum, it may also be due to a primary ovarian malignancy. Commenters suggested that the proposed code for malignant ascites be created in Chapter 2 (Neoplasms) rather than Chapter 16 (Symptoms, Signs, and Ill-Defined Conditions), since the code malignant ascites is currently classified to (code 197.6) is in the Neoplasm chapter. Participants commented that the proposed “code first malignancy” note may be problematic, as there may be instances when malignant ascites is documented without any indication of the malignancy site.

Assisted Reproductive Fertility Procedure Status

An expansion of code V26.8, Other specified procreative management, has been proposed to create a code for assisted reproductive fertility procedure status. This code would be used in conjunction with the appropriate infertility code to identify patients undergoing fertility treatment. It was suggested that “in vitro fertilization” be added as an inclusion term under the proposed code.

Personal History of Sudden Cardiac Arrest and TIA/Cerebral Infarction without Residual Deficits

New codes have been proposed under subcategory V12.5, Personal history of diseases of circulatory system, for personal history of sudden cardiac arrest and transient ischemic attack or cerebral infarction without residual deficits. A code from category 438 is assigned for patients with residual deficits resulting from a cerebral infarction. A question was raised as to whether the proposed code for personal history of sudden cardiac arrest should be assigned if the underlying cause is known.

The term “sudden cardiac death” is used to describe cases when a person unexpectedly dies very suddenly, due to what is assumed to be cardiac arrest. When a patient survives sudden cardiac death, the diagnosis is actually sudden cardiac arrest, and the underlying cause is usually some type of cardiac arrhythmia or previously undiagnosed cardiac anomaly or condition.

Acquired Red Cell Aplasia

An expansion of code 284.8, Other specified aplastic anemias, has been proposed to create a code for acquired red cell aplasia.

Diagnosis Addenda

Proposed diagnosis addenda changes were reviewed. Highlights of the proposed revisions include:

- Addition of note under subcategory 288.0, Neutropenia, indicating that an additional code should be used for any associated mucositis (478.11, 528.00-528.09, 538, 616.81);
- Addition of inclusion term for “sex reassignment surgery status” under subcategory 302.5, Transsexualism;
- Addition of note under category 331, Other cerebral degenerations, indicating that an additional code should be used, where applicable, to identify “with behavioral disturbance” (294.11) and “without behavioral disturbance (294.10);
- Addition of Excludes note under code 572.2, Hepatic coma, to indicate that a code from category 070, Viral hepatitis, should be used for hepatic coma associated with viral hepatitis;
- Addition of inclusion term for “subchorionic hematoma” under subcategory 656.8, Other specified fetal and placental problems;
- Addition of inclusion term for “atony of uterus without hemorrhage” under subcategory 661.2, Other and unspecified uterine inertia;
- Addition of note under code 996.77, Other complications of internal (biological)(synthetic) prosthetic device, implant, and graft, due to internal joint prosthesis, indicating that an additional code should be used to identify the prosthetic joint (V43.60-V43.69);
- Addition of Index entry for cholesterol, elevated (high), with elevated (high) triglycerides (272.2);
- Revision of Index entry for defect, coagulation, specified type (286.9);
- Revision of Index entry for delivery, complicated (by) NEC, cervical dystocia (661.2);
- Revision of Index entry for delivery, complicated (by) NEC, laceration, periurethral tissue (664.8);
- Addition of Index entry for ectasia, gastric antral vascular (GAVE), with hemorrhage (537.83) and without hemorrhage (537.82);
- Addition of Index entry for hallux limitus (735.8);
- Addition of Index entry for infarct, cerebral, aborted (434.91);
- Addition of Index entry for pneumonia, ventilator associated (999.9);
- Addition of Index entry for tachycardia, junctional ectopic (427.0);
- Revision of Index entry for vulvitis (616.50);
- Revision of Index entry for vulvodynia (625.8).

Procedures

SPY Intraoperative Fluorescence Vascular Angiography

A unique code for intraoperative fluorescence vascular angiography using SPY technique has been proposed in subcategory 88.5, Angiography using contrast material. An alternative would be to create a new code in subcategory 88.9, Other diagnostic imaging. The participants generally supported creation of a new code in subcategory 88.5.

SPY intraoperative fluorescence vascular angiography (or SPY angiography) is a new imaging technology used to test cardiac graft patency and technical adequacy at the time of coronary artery bypass grafting. Unlike conventional angiography, the SPY procedure can be performed quickly and it does not require the introduction of potentially harmful contrast dye. In response to a question from a participant as to whether this technology would be applied to any other vessels (i.e. peripheral) in addition to the coronary arteries, it was noted that the focus is on the coronary arteries at this time.

Thoracoscopic Procedures

Several new thoracoscopic procedure codes have been proposed: thoracoscopic decortication of lung; thoracoscopic lobectomy of lung; thoracoscopic pleural biopsy; and thoracoscopic drainage of pleural cavity. It was suggested that creation of unique codes for additional thoracoscopic procedures be considered at the March 2007 Coordination and Maintenance Committee meeting.

Pelvic Prolapse Repair Procedures Involving Graft or Prosthesis

New codes have been proposed in subcategories 70.5, Repair of cystocele and rectocele, 70.6, Vaginal construction and reconstruction, 70.7, Other repair of vagina, and 70.9, Other operations on vagina and cul-de-sac to identify pelvic prolapse repair procedures utilizing grafts or prostheses. Specifically, new codes would be developed for: repair of cystocele and rectocele with graft or prosthesis; repair of cystocele with graft or prosthesis; repair of rectocele with graft or prosthesis; vaginal construction with graft or prosthesis; vaginal reconstruction with graft or prosthesis; vaginal suspension and fixation with graft or prosthesis; and other operations on cul-de-sac with graft or prosthesis. It was suggested that consideration be given to differentiating the use of synthetic vs. biologic grafts. It was also suggested, in the interest of preserving available space in ICD-9-CM, that adjunct codes for the use of biologic and synthetic grafts be created and assigned in conjunction with the existing pelvic prolapse repair codes, rather than creating several combination codes describing each type of procedure involving graft or prosthesis.

Blood Brain Barrier Disruption

Creation of a code in subcategory 00.1, Procedures and interventions NEC, pharmaceuticals, has been proposed for selective intracerebral arterial infusion. This

code is intended to be used for disruption of the blood brain barrier. However, participants noted that the proposed code description is too broad and should be revised if the intent is to limit the use of this code to this procedure.

A substantial impediment to the delivery of chemotherapy to brain tumors is the blood brain barrier (BBB). The BBB is the lining of the small blood vessels in the brain which prevent many substances such as toxins or drugs from entering the brain. Because most chemotherapy drugs do not cross the BBB very well, patients receive inadequate doses of chemotherapy for brain tumors via conventional medication delivery methods (oral or intravenous). A method that has been developed for improved delivery of drugs to the central nervous system is to disrupt the BBB and infuse chemotherapy into one of the arteries leading into the brain.

Disruption of the blood brain barrier for administration of chemotherapy involves placing a catheter in the femoral artery and advancing it into the carotid or vertebral artery. A solution of mannitol is then administered into the artery. This agent opens the blood brain barrier. Shortly thereafter, chemotherapy is infused into the same artery. Within a few hours, the BBB closes again. The procedure is repeated the following day with disruption of the BBB and chemotherapy administration. The chemotherapy is administered into a different artery of the brain in order to deliver the chemotherapy to a different area of the brain. At this time, disruption of the blood brain barrier is performed only to facilitate the administration of chemotherapy.

Intracranial Monitoring

Three new codes describing intracranial pressure monitoring, intracranial oxygen monitoring, and brain temperature monitoring have been proposed under subcategory 01.1., Diagnostic procedures on skull, brain, and cerebral meninges. Insertion of the catheter or probe for monitoring would be included in these proposed codes. An alternative proposal would be to create four codes to capture catheter insertion sites and five codes to identify specific monitoring parameters. The participants generally supported the option involving the creation of three new codes.

Intracranial pressure, intracranial oxygen, and brain temperature monitoring devices are used in the management of traumatic brain injury, cerebrovascular injury, other brain disorders that produce increased intracranial pressure with a subsequent decrease in brain tissue oxygenation levels. In the treatment of patients with traumatic brain injuries, intracranial pressure and brain tissue oxygen monitoring is recommended in the Brain Trauma Foundation's guidelines because there is evidence that this data has prognostic value and improves patient outcomes.

Implantation of Carotid Sinus Baroreflex

Creation of new procedure codes have been proposed for implantation or replacement of carotid sinus baroreflex activation device (total system), implantation or replacement of carotid sinus lead(s) only, implantation or replacement of carotid sinus pulse generator

only, and removal of carotid sinus baroreflex activation device (total system). Code 39.8, Operations on carotid body and other vascular bodies, would be expanded to accommodate these new codes. Alternatively, the description of code 39.8 could be revised to include the carotid sinus and the implantation of carotid sinus baroreflex activation device could be assigned to this code. A few participants commented that it is too premature, based on the clinical trial status, to create a new subcategory for this procedure at this time. It was recommended that the option involving modification of code 39.8 to allow the use of this code for implantation of carotid sinus baroreflex activation device be implemented.

The Rheos Baroreflex Activating System™ is an implantable medical device designed to electrically activate the baroreflex, the system that regulates blood pressure. It is currently under clinical investigation as a treatment for resistant hypertension. When activated by the Rheos System™, signals are sent to the brain and are interpreted as a rise in blood pressure. The brain works to counteract this perceived rise by dilating blood vessels to allow blood to flow more freely, reducing the heart rate and influencing fluid handling by the kidneys. A surgical implant procedure is used to place the pulse generator in a subcutaneous pocket in the pectoral region below the collarbone. The electrodes are placed bilaterally on the carotid sinuses and the leads run under the skin and are connected to the pulse generator in the chest.

Motion Preserving Technologies (Spine Devices)

A new subcategory for insertion, replacement and revision of posterior motion preservation spinal stabilization device(s) has been proposed in category 84, Other procedures on musculoskeletal system. This subcategory would include codes for: insertion or replacement of interspinous process device(s); revision of interspinous process device or interspinous process decompression device(s); insertion or replacement of pedicle screw based dynamic stabilization device or system; revision of pedicle screw based dynamic stabilization device or system; insertion of facet replacement device(s); and revision of facet replacement device(s). New codes for anterior surgical decompression and posterior surgical decompression of spinal canal were proposed for subcategory 03.0, Exploration and decompression of spinal canal structures. The code description for code 03.09 would be revised to state “Other exploration of spinal canal.” Code 80.09, Arthroscopy for removal of prosthesis, other specified sites,” would be assigned for removal of any of these motion preserving devices.

Although code 84.58, Implantation of interspinous process decompression device, was intended to be specific for the X-Stop device, commenters noted that the code description does not limit the use of the code to this device. There is potential confusion between the description of this code and the proposed new code for insertion or replacement of interspinous process device(s). Either the insertion of any interspinous process device should be classified to a single code or the descriptions of code 84.58 and the proposed new code would need to be revised so that they are clearly distinct from one another. Several participants recommended that the language in the code titles and inclusion terms be consistent with physician documentation found in the medical records.

It was suggested that the coding options be made simpler and that CMS should work with physician specialty groups on standardizing the terminology. Participants recommended that the proposal for new codes for motion preserving spinal devices be revisited at the March 2007 Coordination and Maintenance Committee meeting.

The development of motion preservation technologies potentially allows for spine stabilization without the motion restriction imposed by fusion. Motion preservation technologies can be categorized into the following general areas:

- Interspinous process devices
- Pedicle screw dynamic stabilization systems
- Facet replacement systems
- Intervertebral disc replacements
- Disc repair systems

Interspinous process, pedicle screw dynamic stabilization, and facet replacement devices are placed in the posterior column of the lumbar spine. These devices are intended to provide earlier treatment options without resorting to fusion.

Interspinous process devices are intended to treat leg pain secondary to lumbar stenosis or mechanical back pain due degenerative disc disease. In the continuum of care, these devices are intended to treat patients with earlier stage disease. Interspinous process devices may be free-floating and act as a spacer between the spinous processes at the vertebral bodies adjacent to the symptomatic level. They may provide decompression, or a supplementary decompression procedure may be necessary. The X-Stop device, classified to code 84.58, is an example of this type of device. Other devices that allow for interspinous spacing and motion are in commercial use outside of the US and in clinical trials within the US. Supplementary surgical decompression may be required with these technologies. These devices include the Wallis® device and the Coflex™ device. Other devices are in the developmental stage.

Pedicle screw dynamic stabilization systems are intended for treatment of leg or back pain due to stenosis and/or spondylolisthesis. In the continuum of care, these devices are intended to treat mid-stage disease. These systems provide posterior stabilization forces. They are designed to create a more normal loading pattern across the discs without loss of motion. Various pedicle screw dynamic stabilization systems are under development. These include the Dynesys® System and the Stabilimax NZ™ System (formerly called the MBrace™).

Facet replacement devices are intended to treat leg/back pain due to stenosis or facet degeneration. In the continuum of care, these devices are intended to treat later stage disease. These devices replace facet joints, while retaining motion, and they may provide for some stability. Various facet replacement devices are under development. These include the Total Facet Arthroplasty System™ (TFAS) and the Artificial Facet Replacement System™ (AFRS).

Procedure Addenda

Proposed procedure addenda changes were reviewed. Highlights of the proposed revisions include:

- Revision of title of codes 00.55 and 39.90 to state “insertion of drug-eluting non-coronary vessel stent(s)” and “insertion of non-drug-eluting non-coronary vessel stent(s)”, respectively;
(Commenters noted that changing “peripheral” to “non-coronary” was problematic because other codes exist for certain non-coronary stents, such as intra-cerebral stents)
- Revision of title of codes 53.41, 53.61, and 53.69 to state “... with graft or prosthesis;”
- Addition of note under subcategories 81.0, Spinal fusion, and 81.3, Refusion of spine, indicating that any synchronous excision of (locally) harvested bone for graft (77.70-77.79) should also be coded;
- Revision of title of code 99.14 to state “injection or infusion of gamma globulin;
- Revision of Index entry for reformation, cardioverter/defibrillator (automatic) pocket, new site (skin) (subcutaneous) (37.79).

ICD-10-PCS Update

Staff from 3M solicited participant input on different format options for the ICD-10-PCS files currently available on the CMS web site. Currently, ICD-10-PCS is presented in dozens of separate PDF files. There is a separate “master menu” hyperlink page and separate hyperlinks to the Tables and Index. Another option would be to provide three separate files (Med/Surg and related sections, Ancillary sections, Index) and have a single level of bookmarks within files. A third option would be present one PDF file with hyperlinks generated within the file. There would be a master hyperlink page, nested bookmarks at the front of the Tables, and hyperlinks from each Index entry to individual tables. It was suggested that ICD-10-CM and ICD-10-PCS electronic tools need to be developed soon so that schools can begin to provide education.