Cardiology Documentation in an ICD-10 World

Providence Little Company of Mary Medical Center - Torrance

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ICD-10 Is a Bit More Specific …

“I hear there’s a new ICD-10 code for carpal tunnel syndrome caused by clicking too many times in an EMR system.”
Components

• **ICD-10-CM**
  • The diagnosis classification system developed by the Centers for Disease Control and Prevention, a division of the Centers for Medicare & Medicaid Services (CMS) for use in all U.S. health care treatment settings.
  • Diagnosis coding under this system uses 3–7 alphabetic and numeric digits

• **ICD-10-PCS**
  • The procedure classification system developed by (CMS) for use in the U.S. for inpatient hospital settings ONLY.
  • The new procedure coding system uses 7 alpha or numeric digits, while the ICD-9-CM coding system uses 3 or 4 numeric digits.
ICD-10-CM (Clinical Modification): The Diagnosis Codes
ICD-9-CM vs. ICD-10-CM

Structural Changes

- **ICD-9-CM (Diagnoses)**
  - Category
  - etiology, site, manifestation
  - 3-5 characters
    - All numeric
    - Decimal point after 3rd digit

- **ICD-10-CM (Diagnoses)**
  - Category
  - etiology, site, manifestation
  - extension
  - 3-7 characters
    - 1st is alpha (all letters except U)
    - 2nd is always #
    - Decimal point after 3rd digit
Hypertension: Terminology Changes

- Under ICD-10, Hypertension is *no longer* classified by type (*benign, malignant, accelerated*) but primarily by *etiology and/or manifestation*
- Hypertensive “urgency” or “emergency” were *never* adequate documentation, even under ICD-9!
Hypertension

ICD-9-CM

- Code range: 401.0 – 405.9
  - 33 codes
    - Primary axis: Type
      - Essential hypertension (3)
      - Hypertensive heart disease (6)
        - With or without heart failure
      - Hypertensive CKD (6)
        - With stage 1-4 or unspecified
        - With stage 5 or ESRD
      - Hypertensive heart and CKD (12)
        - +/- heart failure
        - Staging of CKD as above
      - Secondary Hypertension (6)
    - Additional axis:
      - Malignant, benign, or unspecified

ICD-10-CM

- Hypertensive diseases: I10-I15
  - 14 combination codes
    - Primary axis: Manifestation
      - Essential hypertension (1)
      - Hypertensive heart disease (2)
        - With heart failure
        - Without heart failure
      - Hypertensive chronic kidney disease (2)
        - Stages 1-4 or unspecified
        - Stage 5 or ESRD
      - Hypertensive heart and chronic kidney disease (4)
        - With heart failure & stage 1-4 (1)
        - Without heart failure (2)
          - Stage 1-4 or unspecified
          - Stage 5 or ESRD
        - With heart failure & stage V / ESRD (1)
    - Secondary hypertension (5)
      - Renovascular, other renal, endocrine, other secondary, unspecified
Hypertension: Physician Notes

- Hypertension with Heart Disease
  - Codes for hypertensive heart disease are assigned only when the physician describes a causal relationship between the hypertension and the heart disease-e.g. “hypertensive heart disease”
  - On the other hand, if a patient has hypertension and chronic kidney disease, a causal relationship can be assumed by the coder
  - There is no coding distinction between “controlled” and “uncontrolled”
Heart Failure

Not Much Has Changed
Heart Failure

ICD-9-CM

- Code Range: 428.0-428.9
  - **15 codes**
- Axis: Type
  - Congestive heart failure unspecified
  - Left heart failure
  - Unspecified systolic heart failure
  - Acute systolic heart failure
  - Chronic systolic heart failure
  - Acute on chronic systolic heart failure
  - Unspecified diastolic heart failure
  - Acute diastolic heart failure
  - Chronic diastolic heart failure
  - Acute on chronic diastolic heart failure
  - Unsp combined systolic and diastolic heart failure
  - Acute combined syst and dia heart failure
  - Chronic combined syst and dia heart failure
  - Acute on chronic combined sys and dia heart failure
  - Unspecified heart failure

ICD-10-CM

- Code Range: I50.1-I50.9
  - **14 codes**
- Axis: Type
  - Left ventricular failure (1)
  - **Systolic (congestive) heart failure (4)**
    - Unspecified
    - Acute
    - Chronic
    - Acute on chronic
  - Diastolic (congestive) heart failure (4)
    - Unspecified
    - Acute
    - Chronic
    - Acute on chronic
  - Combined systolic and diastolic (congestive) heart failure (4)
    - Unspecified
    - Acute
    - Chronic
    - Acute on chronic
  - Heart failure unspecified (1)
Angina and Coronary Artery Disease

New combination codes: atherosclerotic heart disease with angina pectoris
Angina and Coronary Artery Disease

ICD-9-CM

- Angina Pectoris: 413
  - 4 codes
    - Angina pectoris (3)
      - Angina decubitus (nocturnal)
      - Prinzmetal
      - Other and unspecified
    - Intermediate coronary syndrome 411.1
      (Unstable angina) (1)

- Coronary Artery Disease
  - 8 codes 414.00-414.07
    - Type of heart/vessel
      - Unspecified
      - Native coronary artery
      - Autologous vein
      - Nonautologous biological bypass
      - Artery bypass
      - Unspecified
      - Native coronary artery of transplanted heart
      - Bypass graft of transplanted heart

ICD-10-CM

- Chronic Ischemic Heart Disease: I25.110-I25.799 (select codes)
  - 32 combination codes
- Axis: Vessel (8)
  - Atherosclerotic heart disease of native coronary artery with angina pectoris (1)
  - Atherosclerosis of coronary artery bypass graft(s) (4)
    - Subaxis: vein, artery, nonautologous material, unspecified
  - Atherosclerosis of coronary artery of transplanted heart with angina pectoris (3)
    - Subaxis: Native coronary artery of transplanted heart, bypass graft of transplanted heart, other coronary bypass graft
  - Subaxis: Manifestation (Type of Angina) (4)
    - Unstable angina pectoris, angina pectoris with documented spasm, other forms of angina pectoris, unspecified
Many Outdated Terms Have Disappeared

ICD-9-CM (1 code)  ICD-10-CM (9 possible codes)

- Intermediate Coronary Syndrome (411.1)
  - Unstable angina

- Unstable angina (I20.0)
- Unstable angina as a type of manifestation of atherosclerotic heart disease
  - Atherosclerotic heart disease of native coronary artery with unstable angina pectoris (I25.110)
  - Atherosclerosis of CABG, Unspecified, with unstable angina pectoris (I25.700)
  - Atherosclerosis autologous vein CABG with unstable angina pectoris (I25.710)
  - Atherosclerosis autologous artery CABG with unstable angina pectoris (I25.720)
  - Atherosclerosis nonautologous biological CABG with unstable angina pectoris (I25.730)
  - Atherosclerosis native coronary artery of transplanted heart with unstable angina (I25.760)
  - Atherosclerosis of CABG with unstable angina pectoris (I25.790)
Acute Myocardial Infarction

ICD-9-CM

- Acute Myocardial Infarction
  - 30 codes
- Axes of classification:
  - Site involved (10)
    - anterolateral, other anterior wall, inferior wall, inferoposterior wall
  - Episode of care (3)
    - initial, subsequent, unspecified

ICD-10-CM

- Acute Myocardial Infarction
  - 14 codes
- Axes of classification:
  - Initial MI I21 (9)
    - STEMI (8) [by site]
      - Anterior (3)
        - Left main coronary, left anterior descending, other coronary artery
      - Inferior (2)
        - Right coronary artery, other
      - Other (2)
        - Left circumflex, other sites
      - Unspecified (1)
    - 
  - NSTEMI (1)
  - Subsequent MI I22 (5)
    - Anterior wall
    - Inferior wall
    - Non-STEMI
    - Other sites
    - Unspecified

Initial AMI- occurring within past 4 weeks (not 8), first episode of care

Subsequent AMI - occurring within 4 weeks of previous AMI, regardless of site
Documentation Clarification: AMI

• Inadequate Documentation: “AMI with successful stenting”
• Clarification opportunity for location of the acute myocardial infarction; final documentation

“STEMI involving left anterior descending coronary artery”
“STEMI involving LAD”
Documentation Clarification: Subsequent AMI

• The same patient is readmitted with chest pain, AMI 3 weeks ago
• Inadequate Documentation:
  • “Recent AMI with successful stenting now with occlusion beyond the stent with possible new infarct”
• Clarification opportunity for location of the acute myocardial infarction. Final documentation:

  “Subsequent STEMI of anterior wall”
Complications Following AMI

*New codes*
Complications Following AMI

ICD-9
- Rupture of Chordae Tendineae
  - 429.5
- Rupture of Papillary Muscle
  - 429.6
- Acquired Cardiac Septal Defect
  - 429.71

ICD-10
- Rupture of Chordae Tendineae
  - As current complication following AMI I23.4
  - Not elsewhere classified I51.1
- Rupture of Papillary Muscle
  - As current complication following AMI I23.5
  - Not elsewhere classified I51.2
- Acquired Cardiac Septal Defect
  - Atrial septal defect as a current complication following AMI I23.1
  - Ventricular septal defect as a current complication following AMI I23.2
  - Cardiac septal defect, acquired I51.0
Complications of STEMI/NSTEMI

New Codes

- Addition of new code category for certain complications following STEMI/NSTEMI within 28 days
  - I23.0 CC   Hemopericardium as current complication following AMI
  - I23.1 CC   Atrial septal defect as current complication following AMI
  - I23.2 CC   Ventricular septal defect as current complication following AMI
  - I23.3 CC   Rupture of cardiac wall without hemopericardium as current complication following AMI
  - I23.4 MCC  Rupture of chordae tendineae as current complications following AMI
  - I23.5 MCC  Rupture of papillary muscle as current complication following AMI
  - I23.6 CC   Thrombosis of atrium, auricular appendage, and ventricle as current complications following AMI
  - I23.7 CC   Postinfarction angina
  - I23.8 CC   Other current complications following AMI

- These are add-on codes—the code for initial or subsequent STEMI/NSTEMI is coded as well
Documentation Clarification: Complication of AMI

• The same man is readmitted with chest pain, subsequent AMI, s/p CABG
• Findings:
  • 100.1°F (38.4°C), slight friction rub, echocardiogram post CABG indicates mild hemopericardium
• Inadequate Documentation: “Doing well”
• Clarification opportunity. Final documentation:

  “Hemopericardium complicating subsequent STEMI as evidenced by effusion on ECHO, slight fever and friction rub”
Cardiac Arrest:
(Not OB, Newborn, or Anesthesia Related)

ICD-9-CM
- Codes: 427.5, 997.1
  - 2 codes
- Specificity:
  - NOS (427.5)
  - Postoperative (997.1)

ICD-10-CM
- Codes: I46.2, I46.8, I46.9, I97.120
  - 7 codes
- Type/Subtype (Etiology):
  - Cardiac arrest
    - Due to underlying cardiac condition
    - Due to other underlying condition
    - Cause unspecified
  - Intraoperative cardiac arrest
    - During cardiac procedure
    - During other procedure
  - Postprocedural cardiac arrest
    - Following cardiac procedure
    - Following other procedure

Document cardiac arrest and its etiology

Example: “Cardiac arrest due to ventricular fibrillation”
Non-Rheumatic Heart Valve Disorders

Codes now reflect manifestation, i.e., stenosis, insufficiency, both, other, unspecified
Heart Valve Disorder

**ICD-9-CM**

- Code Range: 424.0-424.3
  - 4 codes
- Specificity (Anatomic)
  - Mitral valve disorders
  - Tricuspid valve disorders
  - Aortic valve disorders
  - Pulmonary valve disorders

**ICD-10-CM**

- Code Range: I34.0-I37.9
  - 20 codes
- Specificity (Anatomic)
  - Mitral
  - Tricuspid
  - Aortic
  - Pulmonary
- Type of Disorder:
  - Insufficiency
  - Prolapse
  - Stenosis
  - Other
  - Unspecified

Note: Unspecified aortic/mitral and multiple valve disorders default to rheumatic valve disease unless specified as nonrheumatic.
ICD-10-PCS
The Procedural Coding System
Physician Notes

- ICD-10-PCS codes are only used to code inpatient procedures
- Your office will continue to bill your professional fees (at least for now) with CPT codes
- To submit a bill, the hospital must have all seven characters of any ICD-10-PCS code – that applies to every procedure during the inpatient stay
Principles for ICD-10-PCS Documentation

• Eliminate eponyms
• Describe each component of your surgical procedure
• Describe the intent of the procedure
  • Dilation, amputation, excision, resection
• Describe your approach if at all ambiguous
• Describe any devices placed in the patient and where they were placed
ICD-9-CM vs. ICD-10-PCS

Structural Changes

• ICD-9-CM (Procedures)
  - 3-4 characters
  - All numeric
  - Decimal point after 2nd digit

• ICD-10-PCS (Procedures)
  - 7 characters
  - All letters except “I” & “O”
  - No decimal point
  - Each letter or # is called a “value”
ICD-10-PCS

Device

0  Drainage device
2  Monitoring device
3  Infusion device
7  Autologous tissue substitute
C  Extraluminal device
D  Intraluminal device
J  Synthetic substitute
K  Nonautologous tissue substitute
L  Artificial sphincter
M  Stimulator lead
Y  Other device
Z  No device

Interventional Cardiology

Dilation Devices (Stents)
- Drug-eluting
- Non-drug-eluting
- Radioactive

Insertion Devices
- Monitoring device, pressure sensor
- Monitoring device
- Cardiac lead, pacemaker
- Cardiac lead, defibrillator
- Cardiac lead
- Pacemaker, single chamber
- Pacemaker, single chamber, rate responsive
- Pacemaker, double chamber
Angioplasty Codes

- ICD-9-CM
  - 1 code (39.50)

- ICD-10-PCS
  - 854 codes

ICD-10-PCS Examples

047K04Z Dilation of right femoral artery with drug-eluting intraluminal device, open approach

047K0DZ Dilation of right femoral artery with intraluminal device, open approach

047K0ZZ Dilation of right femoral artery, open approach

047K34Z Dilation of right femoral artery with drug-eluting intraluminal device, percutaneous approach

047K3DZ Dilation of right femoral artery with intraluminal device, percutaneous approach
Building an ICD-10 Procedural Code

PTCA with 1 DES

027034Z

PTCAs are always:

Section 0: Medical & Surgical
Body System 2: Heart & Great Vessels
Root Operation 7: Dilation

0: one site
1: (2) sites
2: (3) sites
3: (4+) sites

0: open
3: perc
4: perc endoscopic

4: drug-elut
D: non-elut
T: radioactive
Z: no device

6: bifurcating
Z: no qualifier
Echocardiogram
Building an ICD-10 Procedure Code

Echocardiogram, right and left heart

B246ZZZ

Imaging  Heart  Ultrasonography  Heart, right and left  No contrast  No qualifier  No qualifier
## Echocardiography

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<th>Qualifier Character 6</th>
<th>Qualifier Character 7</th>
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<td>D</td>
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- **B246ZZZ**
  - Echocardiogram, right and left heart

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Cardiac Stress Test
Building an ICD-10 Procedure Code

Cardiac stress testing

4A12XM4

Measurement and Monitoring
Physiologic systems
Monitoring
Cardiac
External
Total activity
Stress

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# Cardiac Stress Test

## A Coder’s Approach

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Stress Thallium Study
Building an ICD-10 Procedure Code

Stress thallium

C22GSZZ

Nuclear medicine
Heart
Tomographic nuclear medicine imaging
Myocardium
Thallium
None
None
# Stress Thallium

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<th>Qualifier Character 6</th>
<th>Qualifier Character 7</th>
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Summary

• Don’t try to focus on all the new codes
• Remember that what’s essential is providing the information necessary to code
• Eliminate eponyms
• Use anatomic terminology
• Describe each component of the procedure
• Go through the online modules for even more detail
• Work with your clinical documentation/coding team
JA Thomas
ICD-10
Clinician
(Peer-to-Peer)
Web-Based
Video Training Modules
The Commons
An introduction to the Diagnosis Calculator and Specialty Content Training for ICD-10
Log-in at: https://www.commonslearning.com/eco_login.php
Specialty Modules

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100% Completed

Phase 2: ICD-10
All Specialty Content
Phase 2: Specialty Training
ICD-10 Phase 2 training by specialty.
Your Course Progress
47%

EPIC
ICD-10 Training
This course contains the training content for Epic & ICD10.
Your Course Progress
100% Completed
ICD10 Specialty - Internal Medicine Part 1

Key slides:
- 3, 10, 12, 15, 27, 28, 40-42, 44, 46, 48

Reviewer: Dr. Sean Tushla – Providence Portland Medical Center.

Completion Requirements:

To receive credit for completion you must Pass the test on slide 50 of this presentation. If you do not pass the test you must close the module and reopen it. Upon reopening the module you must choose Not to resume where you left off, thereby restarting the test. Once you have passed the test you must further click the Green Mark Done button to receive completion.

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Click Here to begin module
Listen to the Module
Answer questions at end. A 100% is required to complete.
Internal Medicine - Hospitalist Part 1 Questions

Your Score: 100% (3 points)
Passing Score: 80% (2.4 points)

Result:
✓ Congratulations, you passed.

Click Here to Continue
Click Here to Close & Continue
You are Done! Click here to go continue and close or to complete your next module.
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"I’m sorry, the doctor no longer makes diagnoses."
You Don’t Order Coffee the Way You Used to...

Large black coffee

Venti
3/4 Caff
Skinny
Vanilla
No foam
Latte

It’s Time to Add Specificity to Your Documentation Too.
Questions?

andrew.dombro@jathomas.com