Applications and Technologies Collaborative

ICD-10 – Physician Impacts

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Overview

The mandated[1] transition from ICD-9 to ICD-10 as of October 1, 2013 creates challenges for all health care entities. These challenges vary by type of health care entity. Hospitals, for example, will see significant impacts related to DRGs, medical records documentation, institutional procedure codes, and other areas of impact more related to the hospital environment. Medical policies, adjudication rules, risk prediction, and a wide variety of analytics will represent significant impacts for payers. This paper will focus on some of the challenges and potential impacts of this transition from the perspectives of the physicians and practice staff.

Coding Challenges

There is no doubt that the transition from ICD-9 to ICD-10 will result in substantial coding challenges due to significant changes in:

- Code Structure
- Coding Rules
- Number of codes
  - ICD-9-CM (diagnosis) = 14,432
  - ICD-10-CM (diagnosis) = 69,368
- Definitional changes
- Code detail
- Code sequencing and code relationships
- Categorization changes

For most physicians, coding is viewed as a "necessary evil." Codes are not generally considered a way of documenting or communicating the patient's condition, but more so as tasks that need to be performed to ensure payment. Coding tasks and responsibilities are typically assigned to office staff who identify the necessary codes, which then usually are stored in the practice's computer system and also used in preparing and submitting health insurance claims. To a large degree, the operational disconnect between the coder and the physician results in suboptimal coding quality, which in turn results in inaccurate processing of insurance claims and unreliable or misleading data that may be used for clinical management or business operations analysis.

ICD-10 offers substantial improvements over ICD-9 in defining the patient's condition. With the potential for better alignment between physician documentation and coding processes, the accuracy and efficiency of claim processing and analytics can be greatly improved under ICD-10.

Example: Today using ICD-9 procedure codes there is only a single code for amputation of the finger. In ICD-10-PCS there 32 codes defining which finger, which level and which approach. An amputation of the small finger at the tip of the finger requires minimal treatment and has minimal risk of disability. An amputation through the mid portion of the index finger however, requires a ray index amputation (complete removal of the rest of the index and metacarpal) and a reconstruction of the long finger to convert it into a functioning index finger. This type of amputation requires significant surgical intervention, and is at risk for

[1] http://edocket.access.gpo.gov/2009/pdf/E9-743.pdf

significant long term disability. Under ICD-9, we cannot tell the difference where as under ICD-10 the level of detail delineates the extent of the severity and risk of the amputation.

Unless the migration to ICD-10 is paired with a change in documentation and coding practices, ICD-10 will simply be a burden with little benefit.

New Documentation Requirements

ICD-10 impacts physician documentation requirements in both the office and hospital settings. Many physicians consider additional documentation requirements to be an unnecessary burden imposed by the mandated federal requirement of transitioning to ICD-10. Physicians are concerned about the dramatic increase in the number of codes equating to a dramatic increase in documentation time and complexity. Addressing these issues directly will be a critical part of engaging physicians as will be discussed subsequently.

When looking at new documentation requirements, there are some key points to consider.

- Codes in ICD-10-CM are combination codes with considerable repetition of the same concepts. This format results in a large number of codes that are generally the same, with the exception of one or two concepts.

Example: About 25,000(36%) of all ICD-10-CM codes are different only in that they distinguish "right" vs. "left."

- Although there are lots of codes, there is a finite set of concepts.

Example: There are currently 33 ICD-9 codes related to a fracture of the radius. In ICD-10, there are 1,818 codes related to fracture of the radius. Although there are obviously a lot more codes in ICD-10 for the same condition and these codes do provide significantly more detail, there are really only about 52 distinct concepts in those 1,818 codes that repeat in patterns, resulting in this dramatic increase in the number of codes.

- Most of the new concepts introduced in ICD-10 codes are concepts that any physician should be documenting now. It would be difficult for a physician to say that documentation of these concepts is unnecessary since they play a significant role in understanding severity, risk, co-morbidities, causation, and a variety of other important parameters related to proper health care assessment and treatment.

Example: The definition related to fractures through the growth plate in children is very limited in ICD-9. ICD-10 however includes codes that define growth plate fractures based on the Salter-Harris I-IV classification. This is a long-standing and widely used classification that identifies significant differences in risk of deformity and need for surgical treatment related to these growth plate fractures. It would be unreasonable for a physician to claim that this classification is not an important part of clinical documentation or that it is an unnecessary documentation burden.

- Documentation requirements vary greatly by specialty or clinical domain. Codes related to ophthalmology have changed little in scope where as codes related to the musculoskeletal system have increased dramatically. Over 50% of the ICD-10

codes are related to musculoskeletal conditions. Over 17,000 ICD-10 codes (~25%) are related to fractures.

Finding the Right Codes

ICD-10 poses considerable challenges in searching for the right codes to consider in any clinical scenario.

- The sheer number of codes in ICD-10-CM results in a commercial coding manual that is over 1,100 pages with very small type.
- The Alphabetical index, besides being large, is also difficult to navigate.

Example: In searching for a code based on the basic concept of "Coronary Artery Disease" + "Angina," the user is redirected to other areas in the same document six times before finally getting to a reference code to look up in the Tabular Index. If the user now adds any other associated concepts like "post-bypass," the search process is quite different.

- The same concepts may exist in multiple different categories.

Example: If an analyst is looking for all codes related to the medical concept of hypertension, they will find 14 codes listed in the Tabular Index under "Hypertensive Disease." However, there are 155 codes in 14 other categories that relate to some form of hypertension. Codes that include the concept of 'Hypertension' related to pregnancy, neurologic, renal, or other domains may be found in categories related to those conditions and not in the category "Hypertensive Disease."

Without the use of a computer-assisted code search tool, office coders will struggle in trying to use traditional paper manuals.

Training

The training requirements imposed upon coders will be significant. Fortunately, much of the documentation format in the Alphabetical Index and Tabular Index for ICD-10-CM is similar to ICD-9 (diagnosis). Significant factors to consider related to training include:

- Offsite training probably will be necessary given the amount of time to provide adequate instruction. Many local certified training programs are becoming available.
- A train-the-trainer approach makes the most sense for many organizations, but investing in developing deep knowledge of ICD-10, as well as good training skills, can be challenging.
- A field testing project[1] conducted by the American Hospital Association (AHA) and the American Health Information Management Association (AHIMA) suggested that 16 hours of training and an additional 10 hours of practice should be anticipated for ICD-10-CM (excludes PCS). These hours, however, were based on an estimate by a selected group of participants from the study who, by definition, had little exposure to ICD-10-CM outside of the study. Based on anecdotal discussion with other experienced coders, trainers, analysts and

[1] http://www.ahima.org/downloads/pdfs/resources/FinalStudy_000.pdf

consultants, there appears to be general agreement that training requirements could be substantially more than were suggested by this study. At this point, there is no reliable estimate of the amount of training that will be required.

- Testing of coding activities will be needed to determine the point at which training would be considered sufficient. Ongoing testing will be required to measure coding quality and the need for further education.

Coding Tools

As noted above, the challenges in dealing with the volume and complexity of ICD-10 codes generally will require the use of some form of coding tool. A recent Advisory Board Company research report[1] provides further insights into the considerations for evaluating some of these tools.

- Physicians will need to assess their current coding practices and workflow in their practices to define the functionality needed in a coding tool.
- Physicians and their practices will need to consider moving from manual to computerized coding tools if they have not already made that transition.
- Current ICD-9 tools will need to be supplemented with new ICD-10 tools. During the transition and for some time thereafter, coding will need to support both ICD-9 and ICD-10.
- The process of code searching will require different functionality and interface design to support the changes in ICD-10. Merely updating an existing ICD-9 tool to also support ICD-10 probably will not be adequate. The substantial changes in the size, definition and structure of these codes will require a different approach selecting the codes most accurately represent the clinical condition or procedure.
- Testing these tools with high volume/high dollar/high complexity clinical scenarios will be needed to assure that the needed functionality actually works as anticipated.
- Different specialties or clinical domains will require different functional capabilities.

Operational Impacts

Each hospital and physician office will need to anticipate and plan for the operational impact that the transition to ICD-10 will impose. Surprises at the 11th hour will prove very disruptive to clinical and business operations.

Workflow Disruptions

Workflow disruption before, during, and after the transition should be considered so that appropriate planning can be done to minimize the impact.

- Training will require time loss for key members of the team; some plan for backfilling or resource supplementation should be considered.
- Coding productivity will be significantly impacted.

[1] Advisory Board Research Report -- ICD-10 Vendor Evaluation (January 2011)

  - The Canadian experience[1] suggests that coder productivity in a hospital setting was negatively impacted by 50% and did not significantly regain normal productivity levels for well over a year.

- Initial challenges with coding quality and accuracy, as well as payers' struggles with processing during the transition, may result in increases in insurance claims being denied or paid inappropriately, requiring labor intensive reworking and resubmission of those claims by office staff.
- Physician productivity may similarly be impacted because of new documentation requirements and the increased physician querying that may be needed to support ICD-10 coding

The SuperBill

Arguably, the Superbill contributes to incomplete and inaccurate coding. The use of the Superbill as an instrument for collecting data to be used for coding purposes probably will not be practical under ICD-10. This reality will force a major change in office workflow, particularly as patients check out of the office, where point-of-service billing information is needed.

Example: Although there are 33 codes for fractures of the radius in ICD-9, most orthopedic practices' Superbills generally include only six codes or less. Coding often defaults to one of these codes, even though another of the other 33 codes might have been more accurate.

Under ICD-10 there are 1,818 codes for fractures of the radius and there is simply not enough room to include these codes, plus the thousands of other relevant codes, on a standard Superbill. ICD-10 codes have much less in the way of general codes and in many instances force the use of very specific choices for a defined condition.

Electronic Health Record Systems

Many hospitals and physicians have or are acquiring electronic health record (EHR) systems to modernize their operations. Much of this activity is driven by the HITECH[2] stimulus provisions related to "meaningful use" of this technology. Unfortunately, the requirements for these systems to support ICD-10 coding in a "meaningful" way are lacking. Most vendors will assert that their EHR systems will support ICD-10, but in most cases, this simply means that the system can support the collection and maintenance of codes. In reality, the functional requirements under ICD-10 will need to go much further than just the ability to access and store ICD-10 codes.

Some of the functional considerations will include:

- Updates to user interfaces to support:
  - ICD-10 descriptions
  - Search for codes in a robust way that supports the complexity of the ICD-10 structure and new coding rules and definitions.

[1] Implementation of ICD-10: Experiences and lessons learned from a Canadian Hospital, AHIMA - http://library.ahima.org/xpedio/groups/public/documents/ahima/bok3_005558.hcsp?dDocName=bok3_005558[12/21/2010 4:22:03 PM]

[2] http://www.hhs.gov/ocr/privacy/hipaa/administrative/enforcementrule/hitechenforcementifr.html

- The increased number of codes supported by the new 5010 claims transaction.
- Help in documentation to provide prompts for documenting critical concepts needed for coding based on the condition.

Example: If an orthopedist using an EHR system enters the condition of a fracture through the growth plate in a child, will the system prompt the physician that other concepts, such as "Salter-Harris classification," "joint involvement," "displaced/non-displaced," level of healing, and other key parameters, will be needed to accurately code this case?

Business Systems

Revenue cycle management systems for both hospitals and clinics will need to be updated to support coding in ICD-10, as well as 'typing' of ICD codes to differentiate ICD-9 from ICD-10. They will need to be able to handle both ICD-9 and ICD-10 codes for quite some period of time after the implementation date, as claims with *pre-implementation* dates of service may still require ICD-9 codes. Similarly, some HIPAA non-covered entities, such as casualty or industrial injury claims processing entities, may still be using ICD-9.

Financial Impacts

Some physicians believe that ICD-10 will have little business impact on them because payments for their services are not directly associated with these codes. However, indirect impact may be a far greater concern. Invalid or inappropriate ICD-10 codes may result in denial of claims.

Cost of Compliance

Based on the discussion to this point, it would seem obvious that there will be a substantial cost associated with implementation of ICD-10 by physician offices. These costs may vary widely, and the actual cost for any physician practice will be difficult to assess. Some studies, such as the one by Nachimson Advisors[1] in October 2008, illustrate the potential costs (See table below).

	Typical Small Practice	Typical Medium Practice	Typical Large Practice
Education	$2,405	$4,745	$46,280
Process Analysis	$6,900	$12,000	$48,000
Changes to SuperBills	$2,985	$9,950	$99,500
Information Technology Costs	$7,500	$15,000	$100,000
Increased Documentation Costs	$44,000	$178,500	$1,785,000
Cash Flow Disruption	$19,500	$65,000	$650,000
TOTAL	**$83,290**	**$285,195**	**$2,728,780**

As noted above, this is just one illustration of projected costs, offered in 2008. Since that time, subsequent research suggests the actual cost of migration may be

[1] http://nachimsonadvisors.com/Documents/ICD-10%20Impacts%20on%20Providers.pdf

substantially higher. Though the international version is in wide use in other countries, the US version of the ICD-10 codes and the way we use these code in processing is considerably different than other countries. No US entity has completed this migration process to date, so the actual cost experience remains to be seen.

We believe the cost for updating a 300 bed hospitals will range from two to three million dollars for total cost.

Claim Denials or Delays

Given the challenges presented of both the coding on the hospital and physician offices' side, and the remediation of processing rules on the payers' side, physicians, hospitals,and other providers may see a significant increase in denials. These denials may result from changes in remediation of medical policies, or may occur after transition due to refinements in processing rules based on the increased granularity of these codes. In addition, if payers rely on "crosswalks" to convert submitted ICD-10 codes backward to ICD-9 codes, there may be unintended consequences in processing those claims. Payment or approval of services may be denied due to misinterpretation of the intent of policies or rules simply as an artifact of errors of translation of ICD-9 codes to ICD-10.

Prior Authorization and Referrals

Many prior authorization "triggers" or rules for evaluation, found in payers' system, are based on ICD-9 procedure and diagnosis codes. After implementation of ICD-10 there are likely to be changes in how the prior authorizations are triggered or approved. Similarly, cases that require referral may be defined differently in ICD-10, based simply on migration from ICD-9 to ICD-10.

Auditing, Fraud, and Abuse

Due to changes in health legislation and the strain of financial pressures on the health care system, the focus is increasing on controlling services that are deemed to be inappropriate. Recovery Audit Contractors (RAC), Hierarchal Condition Categories (HCC), fraud, abuse, and other audits are increasing in depth and breadth. To some degree the complexity of ICD-10 during the transition period may actually impede some audits initially. There is little doubt, however, that the specificity and detailed level of information supported by these codes will result in much greater scrutiny of documentation to support these more detailed codes. In the "Justification of Estimates for Appropriations Committees"[1] published by the Department of Health and Human Services (HHS) for Fiscal Year 2011, CMS is proposing an increase in information technology spending on fraud, waste and abuse systems which is double the 2009 budget. This allocation represents a significantly larger increase than any other area in this category. In its publication, HHS states:

> *"Although the ICD-10 code set will not eliminate all fraud, waste, and abuse, CMS believes that its increased specificity will make it much more difficult for fraud, waste, and abuse to occur."*

[1] http://www.cms.gov/performancebudget/downloads/cmsfy11cj.pdf

Pay for Performance

Value-based purchasing and overall trends in quality measurement and performance-based payment are having considerable impact on the delivery system, and are expected to be an even bigger factor on payment in the future. Changes in the definition of these measures will significantly impact both quality measurement results as well as target benchmarks. There may be considerable concern about reported changes in physician behavior that are more likely related to coding issues and translation during the two to three years around the implementation date. Inaccurate coding or changes in code based measures under ICD-10 may make it difficult to achieve performance based payment goals.

Case Rates, Capitation, and Other Payment Methodologies

Physicians' participation in Case Rates, Case Mix Adjustment, Capitation(Risk adjusted or condition related), and other payment models may result in more direct impacts to payment associated with the ICD-10 migration. There is currently very little information available to predict the extent of these impacts.

The Future Under The Accountable Care Model

Accountable Care requires a disciplined management of spending to assure that payment is for the right service under the right conditions. ICD-10 will play a critical role in the definition of what the alignment of service and conditions should be. Accountable Care does not envision progressive increases in premium rates based simply on spending experience. Rather, this model is intended to provide a more effective value based approach to health care financing and health care delivery.

ICD-10 is critically important to the success of Accountable Care for a number of reasons:

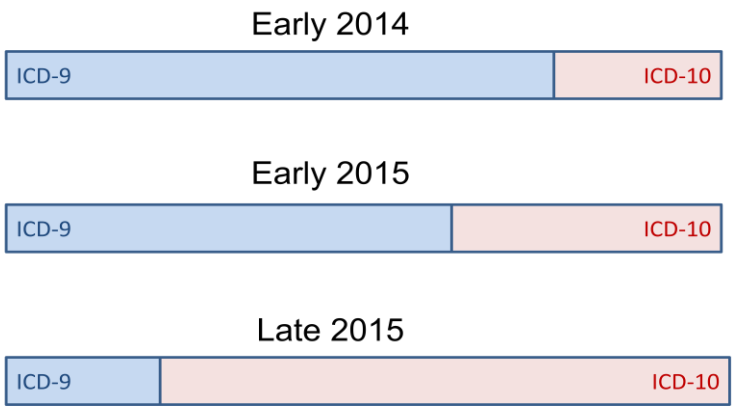
- ICD-10 codes are a mandated cross-enterprise standard for reporting patient conditions and institutional procedures.
- The increased detail of ICD-10 codes will lead to the ability to identify and accurately predict risk, based on severity, co-morbidities, complications, sequelae, and other parameters.
- It will provide a more definitive understanding of the burden of illness within the population.
- It will help increase the ability to appropriately allocate resources based on more finely grained utilization analysis.

Value Measurements

The measurement of the value of health care is an increasing focus and will drive both performance assessment as well as decisions on payment distribution.

Measures of quality, efficiency, comparative effectiveness, and a variety of other measures of the value of care will be significantly different in an ICD-10 environment. Denominator and numerator criteria will require new specifications. The definition of the measures may change significantly based on the nature of the new ICD-10 codes and the new parameters of diseases and services that these provide.

During the transition period, measures that look over multi-year windows may be significantly impacted because of the mixture of ICD-9 and ICD-10 codes in those historical data sets. The following graphic illustrates how this mix of ICD-9 and ICD-10 data might be distributed in a rolling 3 year window of historical data.



Strategies for Physician Engagement

Success across the industry with the implementation of ICD-10 is dependent on improved coding as an initial requirement. If codes do not accurately represent the health condition of the patient or the institutional procedures that are performed to maintain or improve that condition, then all downstream processing and analysis will be suspect. Hospitals rely on physician documentation to provide the basis for coding. Having well trained, high quality coders is of little value if documentation is inadequate or inaccurate. It is critical to engage physicians in a way that aligns them with the importance of good coding, and their role in documentation.

The following represent some important strategies to consider for engaging physicians in a way that aligns for success in ICD-10:

1. Make the Case for Relevance

Demonstrate through outreach education the key points (above) about the impacts that ICD-10 will have on physicians and their offices:

- Impact on coverage, denials, authorizations, and other indirect financial impacts.
- Impact on the measure of the quality and efficiency on the services they provide.
- The value of high quality cross-enterprise data for the benefit of their patients specifically and the patient population in general.
- The future impacts on reimbursement in an Accountable Care environment.
- Impacts of audits for fraud and abuse analysis conducted by outside parties.

2. Make the Case for Good Documentation

Beyond coding, good documentation is just good practice. New documentation requirements are not unreasonable and in general are consistent with best practices for medical assessment and decision making.

3. Find a Physician Champion

Physicians respond better to colleagues or other physicians with shared medical practice understanding. Many physicians, either in practice or in ancillary fields, understand and support the need for better data and the importance of coding to provide information to improve health care practices. With the proper support, these champions can help bring this message forward. Sometimes, an independent physician from outside of the community is more readily accepted.

4. Don't Try to Turn Physicians into Coders

Physicians should focus on what they are trained to do:

- Evaluate patients
- Document findings
- Make assessments and diagnoses
- Determine treatment options
- Implement treatment, based on patients' decisions
- Analyze and synthesize results of studies and outcomes to continually improve care

Coders should focus on proper documentation and use their knowledge of the codes available and the definition and rules related to those codes so that they can consistently represent the facts about the process of diagnosis and treatments to the extent possible given these codes.

5. Don't Try to Make Physicians Learn New Terminology

ICD-10-PCS requires a new set of definitions of medical terms related to institutional procedures that is dramatically different than today's terminology.

Physicians have a long history of using a language with which they are familiar. There is a good case to be made for changes in terminology over time. Much of the current medical terminology is ambiguous, unnecessarily cryptic, and often misleading. We cannot expect, however, that physicians who have spent years speaking this language will effectively adapt to a new language. Medical students should be introduced incrementally to improved terminology and the standards to evolve terminology, but this will not suddenly change on October 1, 2013.

Coding professionals on the other hand are faced with a bigger challenge. Changes in the definition of terms for ICD-10-PCS will require the ability to rigorously adhere to the coding definitional guidelines in ICD-10-PCS, which may conflict with how the physician documents information about a procedure. This may require interpretation and judgment by coders in assessing physician documentation in a way that is currently unfamiliar to most coders.

Example: A physician may perform a procedure where he states that he "removed the right upper lobe of the lung." PCS however would describe this as a resection. Resection is defined as "cutting out or off, without replacement all of a body part." PCS also defines explicitly what are considered body parts and in this case, a lobe of the lung is considered a body part. Removal is defined as "Taking out or off a device

ACRONYM KEY

DRG
Diagnosis Related Group

EHR
Electronic Health Record

EMR
Electronic Medical Record

HCC
Hierarchal Condition Categories

HHS
Department of Health and Human Services

HITECH
Health Information Technology for Economic and Clinical Health

ICD-9
International Classification of Diseases (9th Edition)

ICD-10
International Classification of Diseases (10th Edition)

ICD-10-PCS
International Classification of Diseases (10th Edition) Procedural Coding System

RAC
Recovery Audit Contractors

from a body part." Excision, on the other hand, is defined as "cutting out or off, without replacement a portion of a body part."

The physician documenting the case may use terms like resection, excision and removal interchangeably. The coder however must apply the specific defined PCS term in order to properly code the procedure, regardless of the specific term used by the physician. Every "root operation" in PCS has an explicit definition which in most circumstances is different than current terminology. To ask an obstetrician, for example, to use the PCS term "extraction of products of conception" rather than C-section, will invite conflict. Hopefully advances in terminology interfaces will help to address some of these "language challenges".

6. Provide Feedback

Physician behavior will not change without ongoing feedback. This feedback should include re-visiting educational programs, but more importantly should provide feedback based on specific analysis of their coding patterns and variation from the expected results. Physicians will give a lot more attention to comparative data that is specific to them.

Continued feedback is needed to provide awareness of the potential impact of inadequate and inaccurate documentation to their reputations, their reimbursement, and most importantly, the best care for their patients.

Summary

The impact of ICD-10 on physicians has implications for the entire health care system. Physicians provide the documentation that drives coding. Complete and accurate documentation and coding from physicians and their practices is in the best interest of providers, payers and patients, and will be especially important in an environment of accountable care and health information exchange.

Engaging physicians as partners in this migration from ICD-9 to ICD-10 requires an understanding of:

- The coding challenges that physicians and physician practices face
- Operational impacts to their business flow
- Financial impacts related to the transition
- Impact to measures of physician quality, efficiency and appropriateness
- Strategies for better alignment with physicians to ensure that this migration is a successful joint effort as opposed to an adversarial one