

Misperceptions, Misinformation, and Misrepresentations: the ICD-10-CM/PCS Saga

Save to myBoK

By Richard F. Averill, MS, and Rhonda Butler, CCS, CCS-P

There has been an array of misperceptions, misinformation, and misrepresentations concerning ICD-10-CM/PCS—making it hard to discern the true facts. Due to the increased concerns, bills have been introduced in Congress to postpone or entirely abandon the conversion to ICD-10. In particular, the increase in the number of codes and the existence of codes that will rarely be coded have been used to imply that ICD-10 is too complex and difficult to use. Although this implication is false, it is threatening ICD-10 implementation. The purpose of this article is to separate fact from fiction and address these ICD-10 myths.

Background

ICD-9 and ICD-10 are composed of two separate and independent volumes: a diagnosis volume and a procedure volume. In ICD-9 there are 14,567 diagnosis codes and in ICD-10 there are 69,832 diagnosis codes. In ICD-9 there are 3,878 procedure codes and in ICD-10 there are 71,920 procedure codes. The conversion to ICD-10 requires that all providers, including physicians and hospitals, use the diagnosis portion of ICD-10. However, the procedure portion of ICD-10 is only used by hospitals for reporting inpatient procedures. Physicians will continue to use the American Medical Association's proprietary Current Procedural Terminology (CPT) to report both inpatient and outpatient procedures. All other providers including hospitals will use CPT for reporting outpatient procedures. The reporting requirements for ICD-10 and CPT remain the same as they currently are for ICD-9 and CPT.

ICD-10 Myths

Most of the controversy regarding ICD-10 has focused on the assertion that the code set will impose a major burden on physicians due to its level of detail and the number of codes. However, this assertion is not supported by the facts.

Myth #1: The number of codes used by physicians will increase from 18,445 to 141,752.

This is the ICD-10 myth most often repeated. But since physicians never have to use the procedure portion of ICD-10, this myth misrepresents the facts. Under ICD-10, physicians will have to deal with 69,832 ICD-10 diagnosis codes instead of 14,567 ICD-9 diagnosis codes. While this represents a substantial increase in the number of codes, the impact of that increase, as discussed in myths 2 and 3 below, is highly dependent on the volume of codes that are relevant to a physician's clinical specialty and the type of additional clinical detail that is required by ICD-10.

Myth #2: Because there are substantially more codes in ICD-10, it is more complex and difficult to use.

Complexity and difficulty of use is assumed to be a byproduct of a larger number of codes because it is assumed that physicians and other providers will be burdened by the totality of the number of codes, implying that each provider will have the need to use all the codes. However, physicians and other providers will only use the subset of ICD-10 that is relevant to their patient population (i.e., an ophthalmologist will primarily use only the eye codes). Assuming complexity and difficulty of use merely based on the number of codes is like asserting the English language is overly complex and difficult to use because there are 470,000 words in Webster's unabridged English dictionary. Clearly, no one is expected to know and use all 470,000 words. An individual only uses the words he/she needs, and those words constitute a tiny fraction of the words in the dictionary. The same is true for codes. Physicians and other providers will only use the codes relevant to their patient population, and those codes will constitute a tiny fraction of the codes in ICD-10.

Instead of creating complexity and difficulty of use, the increased number of codes and specificity in ICD-10 make coding simpler. Much of the challenge of accurate coding results from the lack of detail in ICD-9 codes, making them subject to interpretation and disagreements about what they mean and when they should be used. Coding is easier when detailed and precise codes are available. The detail in ICD-10 codes will actually decrease the claims adjudication costs associated with rejected claims and requests for more documentation, resulting in a significant administrative simplification for both providers and payers. When the codes on a claim contain insufficient information, the result is delays in claim payment and requests for additional information—much of which can be avoided with the implementation of ICD-10.

The whole notion that more codes creates complexity and increases difficulty is strangely out of touch with today's digital world. The Internet and companies like Amazon provide an almost unfathomable number of choices (a quick Internet search of the term "ICD-10" results in 13 million matches). Yet despite an almost overwhelming amount of choices, we are actually more efficient and productive. The notion that physicians are incapable of finding the ICD-10 codes they need simply because there are more codes does not reflect today's reality. For example, there is an ICD-10 iPhone App that sells for \$1.99 that allows a person to use a word search function to find an ICD-10 code instantaneously (there's even a free version). Searching through 69,832 ICD-10 diagnosis codes electronically is no different than searching through 14,567 ICD-9 diagnosis codes.

Myth #3: The increase in the number of codes requires the coding of clinically irrelevant detail that is a coding and reporting burden.

The major cause for the increase in the number of diagnosis codes is due to ICD-10 having separate codes for left and right body parts, such as the hip joint. If the left/right distinctions were removed from the ICD-10 diagnosis codes, there would be 25,626 fewer codes. Thus, the option to specify the side of the body part increases the number of ICD-10 codes by 25,626, or 46 percent of the total increase in the number of codes. The side of the body is always well documented in the medical record and does not present a coding or reporting burden.

The second cause of the increase in the number of diagnosis codes is in the injury and poisoning section of ICD-10. There are 39,869 injury and poisoning codes in ICD-10 compared to 2,587 in ICD-9. The right/left distinction is one reason for the increase, but the larger reason for the increase is due to the ICD-10 requirement to specify the stage of treatment of the injury (initial treatment of the injury, follow-up treatment of the injury or treatment of the long-term effects of the injury). As with the right/left body part distinctions, the stage of treatment of an injury is readily known and does not present a coding or reporting burden.

If the right/left distinction and the stage of treatment of an injury are removed from ICD-10, the number of ICD-10 diagnosis codes decreases to 34,954. Thus, after taking into account two obvious distinctions in ICD-10 that do not present a coding or reporting burden, the increase in the number of diagnosis codes from ICD-9 to ICD-10 is less than two and a half times (14,567 to 34,954).

Much of the remaining increase in the number of ICD-10 diagnosis codes is due to a systematic increase in the level of anatomic specificity. For example, in ICD-9 there are 892 codes in the musculoskeletal system, and in ICD-10 there are 6,339 codes. This increase is almost entirely due to the left/right distinction and the addition of more anatomic site detail. For example, there are 23 ICD-10 diagnosis codes for rheumatoid arthritis, each one specifying the joint involved and whether it affects the right or left side. There is one ICD-9 rheumatoid arthritis code, and it contains no anatomic site detail. The additional anatomic detail in the musculoskeletal system is readily known from the medical record and does not present a coding or reporting burden.

For many physician specialties, the difference in the number of codes is fairly modest and most of the codes contain the same detail familiar to users of ICD-9. Where there is new terminology in the new codes, it often replaces obsolete terms in ICD-9 (i.e., the ICD-9 concept of extrinsic and intrinsic asthma is not used in ICD-10).

There are, however, examples where the level of detail in ICD-10 diagnosis codes increases dramatically. For example, consider ICD-9 code 996.1 (Mechanical complication of other vascular device, implant and graft). This code contains no information on the type of surgical complication (i.e., breakdown, displacement, leakage, etc.) and no information on the type of device, implant, or graft (aortic graft, dialysis catheter, arteriovenous shunt, counterpulsation balloon, etc.). In ICD-10, full detail on the type of surgical complication and device, implant, or graft is provided. This results in this one ICD-9 code being

expanded into 156 ICD-10 codes. With the emphasis on linking quality and payment and value-based purchasing, there can be little question that this level of detail is needed.

It should be emphasized that the additional detail was based on requests from the healthcare industry. More than a dozen medical and surgical specialty organizations reviewed and provided clinical input during the development of ICD-10. For example, the American College of Obstetricians and Gynecologists requested that the trimester of a pregnancy be added, the American Academy of Neurology requested that the Glasgow coma scale as well as more detailed codes relating to cerebrovascular diseases be added, and the American Diabetes Association requested more detailed codes for diabetes and complications of diabetes.

Myth #4: Because there are isolated examples of ICD-10 codes that will rarely, if ever, be used, the entire system is riddled with unnecessary detail.

Another variation of the “too many codes” argument is the contention that much of the detail in ICD-10 is unnecessary. However, the primary examples of unnecessary detail that are given are from the external cause of injury section of ICD-10, typically dealing with injuries from animals (alligator versus crocodile bite). There are 1,291 external cause of injury codes in ICD-9 and 6,812 external cause codes in ICD-10. However, except for a very narrow set of external cause codes that deal primarily with medical interventions (surgery on wrong body part), Medicare does not require that physicians or other providers report external cause of injury codes. Further, with the exception of special circumstances like a worker’s compensation claim, few other payers require the coding and reporting of external cause of injury codes. Therefore, use of these codes presents minimal if any coding and reporting burden for physicians or other providers.

Despite the fact that the external cause of injury codes will rarely ever need to be coded and reported, they are used to imply that ICD-10 is riddled with unnecessary detail. Arguing that ICD-10 should be abandoned because a few ICD-10 codes are viewed as unnecessary detail is like arguing that English should be abandoned because it contains the unnecessary word “floccinaucinihilipilification” (which means “the habit of considering things worthless”). The ICD-9 external cause codes also contain codes that could be viewed as unnecessary detail (E800.3 Railway accident involving collision with rolling stock and a pedal cyclist). Yet for the last 30 years, the ICD-9 external cause codes have presented minimal if any burden for physicians or other providers, and likewise the expansion in the number of external cause codes in ICD-10 will present minimal if any burden for physicians or other providers.

Myth #5: ICD-10 was developed by “bureaucrats” who were “out of touch with the real world,” so the system is not relevant to physicians.

This allegation used to undermine the credibility of ICD-10 is simply not true. A division of the US Centers for Disease Control Statistics (NCHS) has stewardship over both the ICD-9 and ICD-10 diagnosis code systems, and it has used the same process for developing ICD-10 that was used for both developing and maintaining ICD-9 over the last four decades. It is an open public forum that continues to this day and welcomes input from any and all stakeholders, including individual physicians in private practice, physician specialty societies, and all other healthcare stakeholders including private citizens. NCHS spent nine years accepting and applying this input to develop the ICD-10 diagnosis code system for the US. This work began in 1994, was released in 2003, and continues to the present with annual updates and modifications coming from this public input process and discussed in a biannual meeting that anyone can attend by phone or in person. Clearly, ICD-10 represents a consensus of healthcare stakeholders as to the level of detail that should be included in the ICD-10 diagnosis codes.

ICD-10 Procedure Code Misconceptions

Because physicians only have to use the diagnosis portion of ICD-10, most of the controversy around the new code set has focused on the diagnosis codes. However, as noted previously, there is also a large increase in the number of ICD-10 procedure codes that will be used by hospitals for reporting inpatient procedures. The expansion in the number of procedure codes is almost totally due to an increase in anatomic specificity and a specification of the approach used to perform the procedure (i.e., open, endoscopic, percutaneous, etc). For example, consider ICD-9 procedure code 39.31 (suture of an artery). This code contains no information on which artery (abdominal aorta, radial artery, etc.) was sutured or the approach used to perform the procedure. In ICD-10, there is full specification of anatomic and approach detail so that this particular ICD-9 procedure code becomes 195 codes in ICD-10.

ICD-10 procedures are structured as tables in which key attributes of the procedure (anatomic site, approach, device, root procedure, etc.) are combined together to create the code.¹ The ICD-10 procedures contain only 3,121 unique terms that are used to form the 71,920 procedure codes. Learning ICD-10 procedure coding is straightforward and involves becoming familiar with the 3,121 terms, most of which are either an anatomic site or a device. Thus, while there is an increase in the number of codes for ICD-10 procedures, this actually makes documentation and coding more straightforward because it is based solely on 3,121 well-defined terms. The focus on the number of ICD-10 codes is difficult to understand in light of the structure of the CPT procedure codes. There are 9,758 five-digit CPT codes. The reporting of procedures for physician billing is composed of the basic five-digit CPT code plus up to four modifiers appended to the five-digit code. There are 30 CPT modifiers such as right/left and bilateral. The modifiers in CPT are really no different than the right/left distinction and the stage of treatment of an injury in ICD-10 diagnoses in that they provide useful and clinically relevant additional information. The possible combinations of the CPT code plus up to four modifiers each with 30 different possible values create essentially a limitless number of possible unique CPT code and modifier combinations. Despite the large number of unique CPT code and modifier combinations, physicians have been able to use CPT successfully for several decades.

Lessening the Burden of Change

It has been argued that not implementing ICD-10 would lessen the total burden of change by eliminating one source of change. However, this argument ignores the dependence of other payment and regulatory reforms on the availability of more detailed and precise diagnosis and procedure data. The enormous investment being made in accountable care organizations, “meaningful use” of electronic health records, and value-based purchasing are all predicated on having more precise diagnostic and procedure information. All parts of healthcare reform need to move forward simultaneously to achieve the desired results. Any lessening of the burden of change that comes from not implementing ICD-10 would come at the price of jeopardizing the long-term success of the healthcare reforms already well underway.

The Cost of ICD-10 Implementation

Numerous partisan studies have attempted to quantify some aspect of the cost of conversion to ICD-10. However, the study commissioned by the National Committee on Vital and Health Statistics (NCVHS) is the most comprehensive and unbiased study on the cost benefit of implementing ICD-10.² NCVHS is the advisory committee to the US Secretary of Health and Human Services on health data, including the adoption of new diagnosis and procedure coding systems. Before recommending the adoption of ICD-10, NCVHS commissioned RAND to do a cost benefit analysis of ICD-10 implementation. RAND concluded that the ICD-10 benefits from more accurate payments, fewer rejected claims, fewer fraudulent claims, better understanding of new procedures and improved disease management would exceed the cost of implementation.

Regardless of what turns out to be the actual cost of implementing ICD-10, the important point is that most of those costs have already been incurred. In the November 2012 Final Rule specifying the adoption of ICD-10, the Centers for Medicare and Medicaid Services (CMS) summarized the investment that has been made in ICD-10 adoption as follows:

“Forgoing ICD-10 translates into a loss of up to \$22 billion for the U.S. health care industry. This does not take into account the projected fiscal and public health benefits that would be lost every year that we use ICD-9.”³

In this highly integrated digital age, systems need to be ready a year in advance in order for there to be adequate time for acceptance testing of integrated systems. With the ICD-10 implementation date of October 2014 looming, these investments have largely already been made.

As CMS noted, there is also a fiscal and public health cost from the continued use of ICD-9 due to the reliance on imprecise data. Use of ambiguous and outdated codes reduces coding accuracy and productivity and makes it more difficult to detect fraudulent claims. Having insufficient detail on the claim increases the cost to both providers and payers due to more rejected claims and requests for additional information. Overall imprecise data results in payments being less accurate, the assessment of quality being less precise, disease management programs being less effective, the efficacy of new technologies being less understood, and the ability to detect new and emerging health threats less adequate.

Conclusions

The increase in the number of ICD-10 codes is overwhelmingly due to the addition of a few well-documented and clinically relevant types of detail such as a specification of the side of the body (right/left). Once this fact is understood, it is clear that the number of ICD-10 codes is not a substantive issue, therefore refuting the main criticism of ICD-10. The reality is that for claims coded in ICD-9, there is often no real identification of what was wrong with the patient and what was done to treat the patient. Given the importance of precise diagnosis and procedure codes to healthcare reforms already underway, the failure to have access to the detail and precision in ICD-10 is no longer a viable option.

Richard F. Averill is Senior Vice President of Clinical and Economic Research at 3M Health Information Systems, Inc. Rhonda Butler is a Development Specialist in Clinical and Economic Research at 3M Health Information Systems, Inc.

Notes

1. Averill, R.F., R.L. Mullin, B.A. Steinbeck, N.I. Goldfield, N.I., and T.M. Grant. "Development of the ICD-10 Procedure Coding System." *Journal of AHIMA* 69, no. 5 (1998): 65-72.
2. Libicki, M., and I. Brahmakulam. "The Cost and Benefits of Moving to the ICD-10 Code Sets." Technical Report, RAND Corporation, March 2004. http://www.rand.org/pubs/technical_reports/2004/RAND_TR132.pdf.
3. HHS. "Administration Simplification: Adoption of a Standard for a Unique Health Plan Identifier; Addition to the National Provider Identifier Requirements; and a Change to the Compliance Date for ICD-10-CM and ICD-10 PCS Medical Data Code Sets." *Federal Register* 77, no. 172, September 5, 2012; p. 54689. <http://www.gpo.gov/fdsys/pkg/FR-2012-09-05/pdf/2012-21238.pdf>.

Original source:

Averill, Richard F.; Butler, Rhonda R.. "Misperceptions, Misinformation, and Misrepresentations: the ICD-10-CM/PCS Saga" ([Journal of AHIMA](#)), June 2013.

Driving the Power of Knowledge

Copyright 2022 by The American Health Information Management Association. All Rights Reserved.