James L. Holly, M.D.

Healthcare and Numbers: Making the Switch to ICD-10 By James L. Holly, MD Your Life Your Health *The Examiner* September 25, 201

The 1992 Movie, *Sneakers*, is about computers, passwords and numbers. It is well worth seeing, if you haven't. In the movie, a company named Setec Astronomy has developed a cryptography machine capable of breaking the encryption of nearly every computer system in the world. The companies name is an anagram of "too many secrets", Science fiction, it shows how important security if for all confidential information and how much numbers are involved in human activity. Each healthcare provider uses millions of numbers in 21st Century medicine. The following discusses some of those numbers.

What is the ICD-9- CM System?

The International Classification of Diseases, 9th Revision, Clinical Modification (ICD-9) is the American version of the *international ICD codes which were* designed for the classification of morbidity and mortality information for statistical purposes and for the indexing of hospital records by disease and operations, for data storage and retrieval. It is sponsored by World Health Organization.

For a number of years, there has been a growing need for a more efficient base for storage and retrieval of diagnostic data in the health field, particularly within the hospital environment. In 1950, the U.S. Public Health Service and the Veterans Administration began independent testing of the international Classification of Diseases for hospital indexing purposes. A New York hospital adopted the ICD-6th Revision, with some modifications, for its records department. Several years later, the Commission on Professional and Hospital Activities adopted ICD with similar modifications, for use in hospitals participating in the Professional Activity Study.

Continued Evolution

In 1966, the international conference for the revision of the ICD-8th Revision constructed the revision with hospital indexing in mind. With studies and input of consultants, the American Hospital Association and the U.S. Public Health Service, the ICD-8 was adopted and served as the basis for coding diagnostic data for both official morbidity and mortality statistics in the U.S.

ICD-9-CM

In February 1977, the National Center for Health Statistics developed the Clinical Modification of the ICD-9 with the valuable aid of many professional associations. In January 1979, the ICD-9-CM, the American Version of the ICD-9, became a single system accepted as a tool for classifying morbidity data for indexing of medical records.

The current ICD-9-CM exceeds its predecessors in the number of codes provided, and provides greater specificity at the fifth digit level of detail. The fifth digits are not optional! On April 1, 1989, the Catastrophic Coverage Act of 1988 made the use of the ICD-9-CM system on all Medicare claims mandatory.

Summary of Important Numbers Used in Healthcare

- 1. **Meaningful Use 2** -- In the computer age, numbers are increasingly being employed for the transmission of information. For instance, in the Meaningful Use 2 requirements, electronic record medical systems must create an eight digit number for the words in symptoms and diagnoses so that information can be transmitted from one provider who has one EMR system to another provider who has another EMR system.
- 2. **ICD-9** Since 1989, healthcare providers have used a numbering system which started with four digits, expanded to five digits, in order to capture the charges for services rendered.
- 3. **CPT Current Procedural Terminology --** CPT[®] is a registered trademark of the American Medical Association. This system assigns a number to each procedure, test or service provided by healthcare providers.
- 4. **HCC/RxHCC** This is a coding system created by the Centers for Medicare and Medicaid Services (CMS) which allows for discrimination between patients who have complex and expensive care needs and patients who have straightforward and less expensive care.
- ICD-10 This is the successor to ICD-9. which has been used by all countries except the USA since 1995. As seen below, ICD-10 will be adopted by the United States in October, 2015.
- 6. **SNOMED (Systematized Nomenclature of Medicine Clinical Terms)**.-- This standardizes how physicians refer to disorders in order to allow comparison of outcomes and of quality metrics. For instance, today a heart attack can be called an "MI," "Coronary Infarction,"

Myocardial Infarction," and many other names. It is impossible to compare quality and outcomes when the names are not even the same.

- 7. **Passwords** If you add to these numbers, the multiple passwords required to secure patient information in the electronic Medical records, you begin to see how complicated these issues are. Several years ago, SETMA added the "smart card" to our system. This is an electronic card which is issued to each person who has access to SETMA's EMR. This card controls access to all areas where sensitive patient information is located and it controls access to the EMR itself.
- 8. **Two Factor Authentication** -- Remote access to SETMA's EHR is controlled by an eightdigit code created by RSA's SecurID. RSA generates a one-time, eight-digit password which is valid for sixty seconds. The number generated is different for every unique user.
- 9. Electronic Prescribing of Controlled Substances -- Starting in October, 2014, healthcare providers are required to use electronic prescribing for controlled substances. This requires a smart-phone device which creates a different eight-digit number to authenticate that the prescriber is the physician to whom that device was issued. Allowing another person to use the physician's code is a criminal act.

If this brief review doesn't convince you how complicate the practice of medicine is, nothing will. However, with electronic patient records, it is possible to do all of this, as SETMA is.

Perhaps the most complex of these tasks is the requirement for providers to move from ICD-9 to ICD-10. In October 2015, the entire healthcare industry is going to be switching to ICD-10. The rest of the world has been on ICD-10 since 1995 when it was first published. Actually, ICD-11 should be ready in 2019 but most experts think that going from ICD-9 to ICD-11 would be more tasking on the system than going from IDD-9 to ICD-10 and then to ICD-11.

The major problem with the migration to ICD-10 is the mapping of diagnoses created in ICD-9 to the ICD-10 codes. The reason this is difficulty is that ICD-9 does not capture the specificity and lateralization of ICD-10. There are only 15,000 ICD-9 Codes but there are 150,000 ICD-10 codes.

A number of companies have prepared commercial solutions to this problem. SETMA chose to use Intelligent Medical Object's (IMO) Problem (IT) Terminology solution. This January, SETMA will conclude our fourth year of using IMO's solution. The good news is that IMO expanded the 15,000 ICD-9 codes into 100,000 codes by giving multiple means for navigating ICD-9. This had a benefit of allowing SETMA to experience the complexity of navigation through 100,000 codes which makes it easier to move to 150,000 ICD-10 codes.

STEPS to ICD-10

The majority of the mapping of ICD-9 codes to ICD-10 codes was done through automation and has already been completed in SETMA's database. However, there are still thousands of diagnoses in SETMA's data base which could not be changed into an ICD-10 code through automation. SETMA has about 13,000 patient records which could not be mapped

automatically. At present each provider is doing the ICD-10 mapping as they see patients starting September, 2014. And, SETMA's Accreditation Team is working on lists of patients. We expect to finish this task by the end of 2014, well ahead of the October 1, 2015 deadline.

If we do our work well, by October, 2015, all of the conversion will have been done and when SETMA switches to ICD-10, it will be easy and automatic. Because **SNOMED** (Systematized Nomenclature of Medicine--Clinical Terms) follows upon the heels of ICD-10 and has already been mapped to ICD-10, SNOMED will be automatically done once we complete the mapping of our ICD-9 codes to ICD-10. In 2019 or 2020, when ICD-11 is released and required to be used, it will be mapped automatically to ICD-10 making the conversion to ICD-11 as simple and as automatic as was the conversion to SNOMED was.

Why is this important to you?

If you healthcare provider does not successfully navigate the next 12 months, he or she will not be able to capture the charges for the services performed and they will not be able to submit bills and receive payments for those services. Your might ask, "Why should I care; after all aren't healthcare providers over paid anyway?" You will discover how much you care when, if your healthcare provider cannot charge, bill and collect fees, he or she closes his or her office and is no longer available to work with you to maintain your health or to treat your illness. In the coming weeks, this column will discuss other aspects of the "business of medicine" which are important to you as a patient.