eMedication Management

Surescripts Safe-Rx Awards Should Change with the Times
By Tony Schueth, Editor-in-Chief

Surescripts recently released its sixth annual ePrescribing usage statistics and state rankings as part of its Safe-Rx Awards. As a health information technology (HIT) strategy and management consulting firm, the awards and stats were a hot topic with Point-of-Care Partners and our clients.

One group particularly interested in the Safe-Rx Awards is the Southeastern Michigan ePrescribing Initiative (SEMI), a coalition of employer, health plan and pharmacy benefit management competitors that has been actively promoting ePrescribing since 2005. (We’re the project management organization of this complex initiative.)

One stakeholder – who is actively involved with Surescripts – said that Surescripts releases the Safe-Rx Awards as a "service to the industry…"

Patient Safety

IOM’s Message to HIT: Clean Up Your Act or You Will Be Regulated
By Mihir Patel, PharmD, RPh

The Institute of Medicine (IOM) — probably the most prestigious and high-powered federal advisory organization in Washington — just released a report expressing its ongoing concerns about patient safety and health information technology (HIT). (You can read the report’s summary by clicking here). Its recommendations were loud and clear: clean up your act, HIT, or you will be regulated — by a new agency within the Department of Health and Human Services (HHS) and not the Food and Drug Administration (FDA).

This is not the first time the IOM has presented recommendations for improving patient safety...

Health Information Exchange (HIE)

PCAST, Query Health and Data Segmentation: Forging a New Path Forward
By Michael Solomon, PhD, MBA

How can we better facilitate health information exchange (HIE), especially for purposes of improving population health? How can we use electronic health records (EHRs) to manage patient health (including the health of vulnerable populations) and coordinate care? In doing so, how can we provide accurate and complete information about individuals and still protect the privacy and confidentiality of the data?

These are major issues we heard during our research of successful HIEs for the National eHealth Collaborative and our work directly with HIE enterprises. The federal government also has heard the message. In response, two newly launched federal programs – Query Health and the Data Segmentation Initiative – are among the latest attempts at the federal level to help provide some answers to these core questions…
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Surescripts Safe-Rx Awards Should Change with the Times
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We suspect Surescripts has traditionally viewed the Safe-Rx Awards as being much more than a “service.” However, if that’s what it is to them now, that may explain why the awards and analyses don’t seem to be as high a priority as they used to be.

Initially, the Safe-Rx Awards helped drive adoption by highlighting and rewarding those prescribers, vendors and states that were ePrescribing the most. Then, evangelist awards were introduced and outside speakers were included, all of whom seemed to be high-ranking politicians, so if there was no intent to influence legislation, rules and regulations, there was most certainly one to reward it.

This year’s evangelist award went to a nonpolitician and deserving soul: John Halamka, MD, a practicing emergency physician who has a long-standing interest in furthering HIT and public service. Dr. Halamka serves as chief information officer (CIO) of Beth Israel Deaconess Medical Center; CIO and dean of technology at Harvard Medical School; chair of the New England Health Electronic Data Interchange Network (NEHEN); and CEO of MA-SHARE (the regional health information organization). He previously chaired the US Healthcare Information Technology Standards Panel (HITSP), which performed yeoman’s work in trying to identify the “right” standards for particular HIT transactions and use cases and then harmonize them. You may also have seen his widely read blog, “Life as a CIO.” We think Dr. Halamka was a fantastic choice!

Dr. Halamka’s state – Massachusetts – was once again first. Among the remaining top 10, Delaware, Michigan, Connecticut, Rhode Island, Pennsylvania and North Carolina were also listed again. South Dakota, Iowa and Oregon are newcomers. Since adoption is up dramatically, it’s good to see those states with a long-time commitment to ePrescribing hold their place as well as some new ones “getting religion.”

As times change, so too do marketplace needs. We would assert that the Safe-Rx Awards can again be more than just a “service.” Here are some suggestions:

- **Announce the Safe-Rx Award criteria in advance.** For the past two years, the Safe-Rx metrics were revealed when the Awards were given in the fall. If the industry knew in advance which metrics were going to be used for a particular year, stakeholders would more likely try to meet them.

- **Make the Safe-Rx awards more timely.** In the spring, Surescripts has traditionally published its National Progress Report on ePrescribing, which chronicles data through the end of the previous calendar year. In the fall (this year, November), it publishes a state-by-state analysis of data from the previous calendar year as part of the Safe-Rx Awards and generally provide an update. (This year’s update was that more than 50% of physicians are now prescribing electronically, a factoid that caught the attention of the media.) Next year, it might consider a more comprehensive update for the Safe-Rx Awards, including a state-by-state analysis through midyear instead of from 10 months earlier.
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- **Consider adding new criteria.** As the ePrescribing world changes, other factors will need to be taken into account. This means that more criteria may be needed or existing criteria may be weighted differently. For example, patient safety and quality will become increasingly important and are candidates for criteria in the future. Could they somehow be woven into the Surescripts formula? (See our next article about new recommendations by the Institute of Medicine concerning patient safety.) Could it report the percentage of prescriptions that are routed on a state-by-state basis, as it has in the past, on a national basis?

- **Look beyond adoption as a measure of success.** As new criteria are considered, it’s helpful to bear in mind that it’s not just about adoption anymore and we need to find more sophisticated ways to measure actual progress.

Consider the following data from the Center for Health System Change, which we observe is a microcosm of the ePrescribing activity in the country.

### Use of ePrescribing Features Within an EHR

<table>
<thead>
<tr>
<th>Feature</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Don’t use ePrescribing routinely</td>
<td>23%</td>
</tr>
<tr>
<td>Check for adverse drug events</td>
<td>65%</td>
</tr>
<tr>
<td>Use ePrescribing to transmit</td>
<td>54%</td>
</tr>
<tr>
<td>Use formulary features</td>
<td>34%</td>
</tr>
<tr>
<td>Use all features regularly</td>
<td>23%</td>
</tr>
</tbody>
</table>

Source: SEMI

It shows that physicians may not be fully using all of ePrescribing’s available features. Why? Some may simply not understand how to use the more advanced features. We have heard there are concerns about accuracy as a result of data quality, a factor that may impede use. Still others may have written just enough ePrescriptions to avoid the penalties that are starting to be imposed under requirements of the Medicare Improvements for Patients and Providers Act (MIPPA) or may be doing the minimum to qualify for meaningful use (MU) incentives. According to data from the Center for Health System Change, drug-drug interaction checks and sending prescriptions electronically are the most commonly used ePrescribing features. Not surprisingly, they jibe with the minimum MU requirements for getting incentive payments and avoiding MIPPA penalties. While we understand that the awards need to be based on what can be measured, we hope Surescripts can begin to factor such realities into the development of future awards.
In summary, now that ePrescribing has really grown over the last few years, Surescripts may want to rethink the Safe-Rx Awards and its criteria so as to make them more relevant. The industry’s continued focus on value and transparency could lead to discussions about which criteria are needed and how they should be measured. In addition, the ePrescribing community might benefit even more if Surescripts were to provide more data sooner. The industry could then ascertain where the successes and opportunities lie and use the information to its best advantage.
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IOM's Message to HIT: Clean Up Your Act or You Will Be Regulated

By Mihir Patel, PharmD, RPh

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In the past few years, it has twice come out with reports that included concerns about the paper prescription process and its numerous potential adverse impacts on patients and the health care system. This formed the impetus for the recent drive for ePrescribing adoption in statutes and regulation. We all know what happened next. The IOM's views are taken very seriously by Congress and the federal establishment, so the HIT industry should pay close attention.

In a November 8 summary of the report, the IOM said it “…finds that safe use of health IT relies on several factors, clinicians and patients among them. Safety analyses should not look for a single cause of problems but should consider the system as a whole when looking for ways to make a safer system. Vendors, users, government, and the private sector all have roles to play. The IOM’s recommendations include improving transparency in the reporting of health IT safety incidents and enhancing monitoring of health IT products.” It also proposed the formation of a new HHS watchdog agency for HIT. The IOM passed on giving the job to the FDA because of concerns about scope, resources and the agency’s already overburdened workload.

This was met with a cautious reception by Farzad Mostashari, MD, head of HHS Office of the National Coordinator (ONC) and chair of the Health Information Technology Policy Committee (HITPC), which develops the core recommendations for meaningful use functionality. According to news reports and a blog posting, Mostashari said he "appreciates the thoughtful work" done by the IOM, but the report "also highlights the importance of health IT to continuously improving health care quality and safety by rapidly and reliably flagging potential patient safety risks and preventing adverse events in the clinical setting." He pointed out that ONC and HHS were already on top of this: “The safety of health IT is one critical element in a larger and longstanding patient safety discussion that includes medical errors, hospital acquired conditions, readmissions, and a host of other issues” that HHS is already working to address through ongoing initiatives. And, of course, ONC would continue to collaborate with the usual suspects to continue to improve patient safety and HIT.

What are we in the HIT world to make of all this? For one thing, the report was based on scanty literature with mixed results. HIT, as we know it or are envisioning it, has not been out there long enough for rigorous, data-driven evaluations. Yet we don’t need a bunch of academicians to tell us there are real HIT-related safety problems of which we need to be mindful and address today. We also know there will be new ones as we go along.

As for the threat of regulation, it is a real possibility down the road. It took several years for the IOM’s recommendations on medication errors to gain traction. There probably isn’t going to be funding anytime soon for any kind of new agency, and there could be internal turf struggles between a new start-up watchdog agency and the FDA. However, when the IOM speaks, the establishment listens and ultimately implements. In the meantime, HHS is likely to double-down on its efforts related to HIT and patient safety.
We’ve been sounding this warning with our clients and anyone who will listen, so it’s good to have some validation. Let us know if you want us to help you sort through the implications to you and your employer, as well as the steps you might take.

**PCAST, Query Health and Data Segmentation: Forging a New Path Forward**
*By Michael Solomon, PhD, MBA*

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Both initiatives are sponsored by the Office of the National Coordinator (ONC) — the group in the Department of Health and Human Services (HHS) that is creating a policy framework for the development and adoption of a nationwide health information infrastructure, including standards for the exchange of patient medical information. In collaboration with the Centers for Medicare and Medicaid Services, ONC is also responsible for defining the criteria for meaningful use (MU) of certified EHRs, which includes a population health dimension that is growing in significance as Stages 2 and 3 are being vetted.

**Query Health**

The [Query Health Initiative](#) will develop standards and services enabling the creation and exchange of specific queries in the area of population health. As a result, requesters will be able to create and securely distribute queries to network data partners who subscribe to the published queries. For example, an entity could query one or more data sources for information concerning all female patients diagnosed with osteoporosis who have/have not experienced a fracture and are currently on a specified medication therapy. Network data partners will execute the query against a standard clinical information model and securely return the results of the query to the requester.

Over time, the Query Health standards are intended to support a sustainable and extensible clinical information model, as well as terminology that enable the queries and results expression. Ultimately, this initiative will enable population analyses to inform both clinical and payment strategies for various health systems and medical practices. It is especially relevant to the underpinnings of the emerging patient-centered accountable care organizations. Query Health will leverage the standards and policies that permit patient care and health information exchange in ways that meet MU criteria.

**The Data Segmentation Initiative**

The [Data Segmentation Initiative](#) will enable the implementation and management of disclosure policies originating from a patient’s request or other disclosure requirements, such as the federal statute protecting disclosure of such sensitive information as

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1 See [our report](#) to NEHC and [our article](#) on realizing the promise of electronic medical records.
Health Information Exchange (HIE) substance abuse or HIV/AIDS. It will examine and evaluate the standards needed for sharing individually identifiable health information, including those recommended by the Health IT Standards Committee (an ONC-sponsored advisory group). The initiative will develop use cases that define the current need for data protection services, such as a patient’s directive not to disclose substance abuse records to certain entities, and will then extend current standards-based software models to demonstrate interoperability. Testing will be based on a reference model aligned with a set of use cases and functional requirements developed through the Standards and Interoperability framework, which is yet another ONC initiative to develop and coordinate HIT standards and services.

Ultimately, these two initiatives will ideally converge to provide a universal language for clinical information that is supported by a meta-model for a standardized means of identifying clinical data, regardless of the source, and determining access constraints at a granular level. All of this stems from recommendations made in last year’s President’s Council of Advisors on Science and Technology (PCAST) report, Report to the President Realizing the Full Potential of Health Information Technology to Improve Healthcare for Americans: the Path Forward. This report is considered a game-changer because its far-reaching recommendations raised the volume on conversations about what it will take to truly achieve the free flow of health information across a nationwide health information network.

PCAST did this by calling for the development of meta-datatype tags to be used for exchanging data across different health care organizations while maintaining the privacy and security of the information. PCAST ultimately envisions the creation of a universal language to express health data originating from different sources (with variations in semantics), and a standard scheme for controlling access to specific data based on specific privacy rules. (See Point-of-Care Partners’ take on the PCAST report in the November 2010 issue of HIT Perspectives and some of our blogs.)

The backbone of the Query Health infrastructure will consist of a standard clinical information model and methods for securing data. Eventually, the work product from the Data Segmentation Initiative will theoretically provide a technical solution to the privacy problem by developing a meta-model of standard privacy attributes that can be applied as “tags” to specific types of data in a patient’s EHR.

So far, the Query Health program is seeking to create pilots, which are in preliminary planning phases. They will be based on a distributed model in which all protected health information remains behind the firewall of the custodian of the data. As a result, this initiative will create forward progress in standardizing data formats and vocabularies.

However, Query Health falls short of addressing the major problem HIEs are devoting significant resources to solving. Detecting noncompliance with provider-specific care guidelines of a population and managing care transitions requires robust semantic interoperability, common medical vocabularies and, most importantly, the sharing and consumption of protected health information across provider organizations.

In addition, the scope of the Query Health initiative is quite far reaching. Despite its focus on population reporting using “de-identified” data, the challenge of developing and gaining wide
Health Information Exchange (HIE)

adoption of a standard clinical information model is daunting. The initiative will certainly be building on appropriate standards already in use but will need to close major gaps, particularly in harmonizing data element sets and specifying a medical vocabulary with a standardized nomenclature to enable accurate interpretation of clinical data with variations in meaning. Depending on the use cases chosen for pilots, Query Health may be a catalyst to further adoption of the RxNorm standard for drugs and drug vocabularies.

Gaining acceptance of the leaders and stakeholders of HIEs across the country is also a major challenge to the Query Health teams. Many of these organizations are still trying to figure out how to incorporate the Direct Project standards and services into their portfolios in a way that adds value and makes business sense. Many of the more advanced HIE enterprises are rapidly developing strategies for adding data analytics services to support the looming population health management needs of accountable care organizations and patient-centered medical homes. How does Query Health advance their value propositions? This is a question that needs a clear answer very soon.