



# DENVER MEDICAL BULLETIN

Official Publication of The Denver Medical Society

Volume 99/Number 6 June 2009

## EHR 201: Selection and Implementation

The second of two workshops on electronic health records was presented by Michelle Holmes, Senior Manager with ECG Management Consultants, and focused on vendor selection and system implementation issues. The talk, entitled EHR 201: Selection and Implementation, was held at the Wellshire Inn on May 13<sup>th</sup>. Both workshops were sponsored by NextGen. The first program had focused on the pros and cons of moving to an EHR and included information on the stimulus package incentives for physicians adopting an EHR system.

Many of the details surrounding eligibility for the stimulus dollars have yet to be settled. Physicians are being cautioned not to launch an EHR transition without careful planning.

"You shouldn't buy an EHR just to get \$44,000," according to a recent comment by Steven Waldren, MD, Director for the Center for Health Information Technology at the American Academy of Family Physicians. "If you don't do your due diligence, there's the potential for big problems."

Ms. Holmes and other experts recommend that physicians carefully assess a practice's needs and set realistic goals. Envisioning how an EHR will transform office routines, work flow, and the management of chronic

disease patients is essential in understanding how EHR implementation can both support and challenge a practice. Practices should be cautious in allowing the federal stimulus package time frames to drive their decision-making process. Selecting the correct EHR for an individual practice means more than rushing to implement a system that does not fit, and may cost the practice more over time in inefficiency and lost productivity. Inadequate planning and selection processes can lead to frustration and system abandonment. An HHS effort four years ago estimated the failure rate for EHR implementations at greater than 30%.

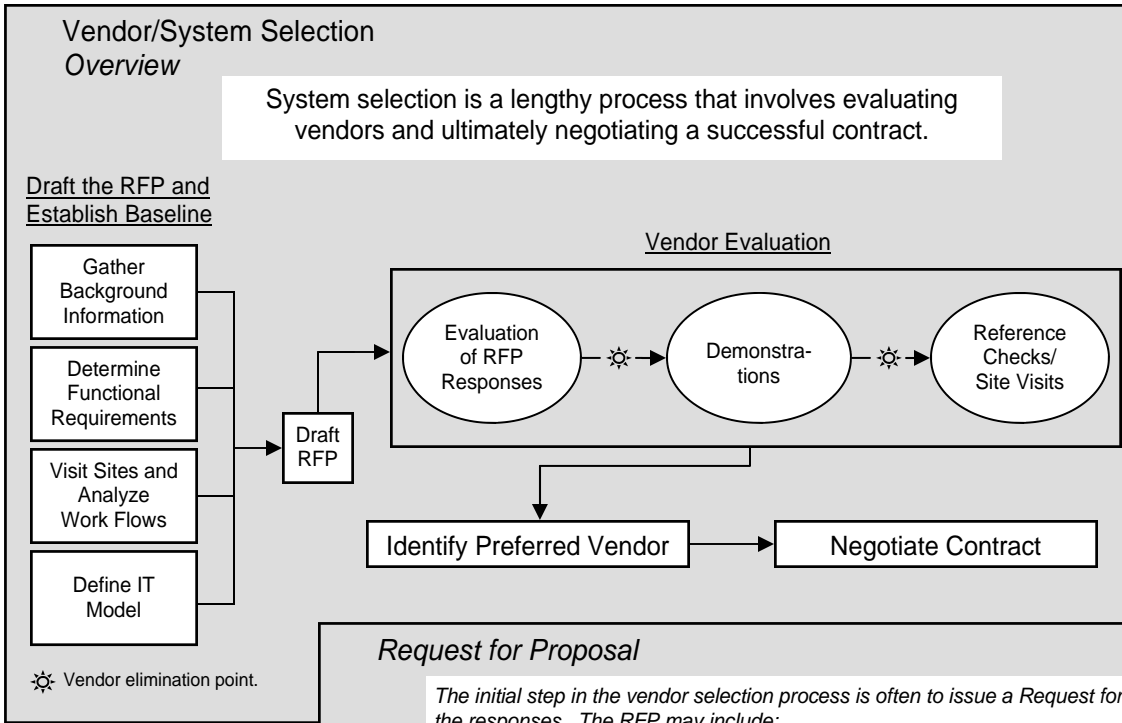
Once the practice has made the decision to move to an EHR, Ms. Holmes emphasized the need for a thoughtful and deliberative process to select the right system for each practice's needs and circumstances. Practices should explore several EHR systems on their own to gain an understanding of what functionalities EHRs can offer and what the experiences of others have been. Research groups such as KLAS ([www.KLASresearch.com](http://www.KLASresearch.com)) and The AC Group ([www.acgroup.org](http://www.acgroup.org)) offer results of EHR user surveys rating vendors on features, implementation processes, training, and support.

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EHR consultant and presenter, Michelle Holmes, with Michael Keller, MD, DMS President-Elect

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Determining system requirements and practice goals, along with developing an understanding of EHR functions and capabilities, are essential first steps in selecting an EHR system.

Developing a comprehensive Request for Proposals (RFP) will help in comparing apples to apples in vendor responses and ensure that all vital issues are addressed.

**Request for Proposal**

The initial step in the vendor selection process is often to issue a Request for Proposals (RFP) and evaluate the responses. The RFP may include:

- Corporate qualifications.
- Practice Management (PM) functionality.
- Electronic Medical Record (EMR) functionality.
- Vendor services.
- Product Technology and integration.
- Cost proposals.

**Demonstrations**

Once the RFP responses are evaluated, a subset of the vendors are selected to demonstrate their products. Clinicians and office staff should attend the demonstrations in an effort to:

- Identify impact on work flows.
- Evaluate ease of use.
- Understand depth of content in specialty areas.
- Determine need for customization.
- Evaluate ease of implementation.
- Compare written response to demonstrated functionality.

**Reference Checks and Site Visits**

The list of potential vendors may be narrowed again prior to contacting references. Site visits should be performed to confirm the selection of the preferred vendor. These components of the process will help to:

- Evaluate vendor responsiveness.
- Understand level of effort.
- Understand actual costs (implementation and support).
- Understand resource requirements.
- Identify timelines and tasks.

If possible, the vendors should not be present during reference checks and site visits.

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System Implementation Phases	
Phases & Durations	Key Activities
Planning 1-3 mo.	<ul style="list-style-type: none"> <li>• Appoint project team members.</li> <li>• Determine rollout sequence.</li> <li>• Finalize data conversion and interfaces.</li> <li>• Train people responsible for configuring the system.</li> <li>• Establish a baseline of current operations (statistical and process).</li> </ul>
Configuration 3-6 mo.	<ul style="list-style-type: none"> <li>• Set up system files and “look and feel” of configurable screens.</li> <li>• Design future desired work flows and staffing (including IT support).</li> <li>• Develop encounter documentation tools for key visit types, procedures, and the like.</li> <li>• Convert existing data.</li> <li>• Develop interfaces.</li> </ul>
Testing 1 mo.	<ul style="list-style-type: none"> <li>• Test the system and processes, as follows:                             <ol style="list-style-type: none"> <li>1. Unit test, testing each component by itself (menus, files, interfaces, converted data).</li> <li>2. Integrated test, utilizing full work flows (front to back) including all interfaces.</li> <li>3. Stress test, using volumes approximating normal daily use.</li> <li>4. Parallel test, validating data from the system against manual operations.</li> </ol> </li> </ul>
Training 1 mo.	<ul style="list-style-type: none"> <li>• Train end users in use of the system as well as revised procedures.</li> <li>• Provide generic PC training as well as EMR system training.</li> </ul>
Go-Live/ Rollout 3 mo. - years	<ul style="list-style-type: none"> <li>• Create a “production” system environment (while keeping a “testing” or “training” copy of the system).</li> <li>• Start loading data into the system for live use (scanning and/or abstracting).</li> <li>• Begin using the system with initial providers or at a single site.</li> <li>• Resolve any post-live system and/or process issues.</li> <li>• Continue rollout to subsequent providers and locations.</li> </ul>

## EHR 201

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Implementation of an EHR system presents another set of challenges, including the initial discussion on timing the introduction of the new system—a “big bang” approach, jumping in with both feet all at once, or a phased implementation. The “big bang” implies bringing all users, locations, and functionalities on line at the same time versus an implementation by user or specialty, a single location at a time, or only certain functions at one time. The advantages of a single implementation schedule are generally a faster time frame, which can achieve all the benefits of the system simultaneously, but may require fixes at the back end and will require substantial resources and planning to accomplish successfully. Phasing in the system will take longer and delay complete functionality, but may lower resource requirements and cause less intense disruption. The system can be modified incrementally, but may still need final modifications after all the pieces are in place, requiring re-training and re-design in some of the early adoption sites or functions.

Regardless of the implementation schedule selected, successful implementation of an EHR requires:

- Widespread buy-in for the acquisition and implementation of an EMR, including the basic concept, the specific system, and provider usage expectations.
- Specific project accountability and leadership.
- An appropriate infrastructure (servers, network, connectivity, desktop hardware, etc.) provided by either the practice or a third party.
- Well-trained individuals who understand clinical operations to implement and support the system.
- Interfaces to key systems (PMS, laboratory, transcription, hospital, etc.) to reduce data entry.
- A strategy to convert from paper-based to electronic charting.
- Understanding of and attention to current work processes and how these will change with use of the EMR.
- Realistic expectations on the part of everyone involved.

Another key concern during the implementation phase is lost productivity and the potential impact on a practice’s bottom line. According to Ms. Holmes, practices that have implemented EHR functionality deeply and quickly recovered initial productivity losses more quickly than those that implemented at a slower pace over a longer period. System vendors frequently recommend patient volume reductions up to 50% during the first 2-3 weeks of EHR use. Additional strategies practices have used to minimize access and productivity concerns include the use of locum tenens, postponing or re-scheduling non-acute visits, increased hours for part-time staff, and phasing in EHR documentation until efficiency is achieved.

To view the full PowerPoint presentations from both of Ms. Holmes’ programs go to [denvermedsociety.org](http://denvermedsociety.org) and select Important Documents.