

Partners Promote Expanded Use of Information Technology

Like the physical highways before it, the electronic information highway connects once-distant points, offering partners new paths to education and communication. From a pre-conference training session for information coordinators to presentation of Internet-based resources integrated into each conference session, information technology played a key role in Atlanta.

More than 50 information coordinators from NIS partnership hospitals attended a week-long workshop showcasing advances in information technology within the US health care system. The workshop included information on the development of hospital-based information technology departments, the creation of the position of chief information officer, the expansion of telemedicine and videoconferencing technologies and the functions of the modern health sciences library. Site visits to Grady Health System, Emory University School of Medicine and Georgia Baptist Medical Center in Atlanta provided the information coordinators with access to tools in these disciplines.

At Georgia Baptist, Bruce Ramshaw, MD, director of telemedicine, explained how US physicians use various telemedicine and distance learning technologies for patient care and medical education services. The tour included a live demonstration of various types of cameras and scopes that physicians can use from remote locations to evaluate or diagnose patients. Ramshaw also demonstrated how Georgia Baptist uses its videoconferencing facilities for surgical proctoring in medical education.

Partners also toured the Health Sciences Library at Emory University, where Library Director Carol Burns discussed the role of health sciences libraries in the United States. Information coordinators learned about the organization of different departments and services of the library, including reference, clinical information and document delivery services, and also received hands-on Medline and Web searching tutorials.

Linda Markwell, head of branch library services at the library explained the "morning report" program at Emory, during which a librarian accompanies physicians on their morning patient rounds to learn about key issues for which additional research is needed.

Expanding Commitment for Information Technology

These information study tours represent "an essential first step" for one of the new directions of AIHA's technology and information resources, said Mark Storey, coordinator of technology and information resources for AIHA. Over the next few months, AIHA will work with NIS information coordinators to promote broader use of information technology in the clinical worksite.

Storey encouraged partners to develop information technologies that can promote wider use of existing tools, including resources used to handle patient records, and technologies that can augment the flow of information and, ultimately, improve patient care. Yet, he added, creating an effective information system doesn't necessarily begin with a huge local area network (LAN) or mainframe database.

"Effective information technology systems should ideally begin in one or two units before being expanded to the broader health care system...especially given the current socioeconomic situation facing many NIS health care institutions," Storey said.

An even greater challenge for expanding these technologies is convincing hospital administrators of the cost savings that result from developing integrated information systems, he said. "Most chief physicians find it difficult to justify investing in computer technology when they have difficulty finding enough money to cover the cost of medications."

During a meeting with partnership chief physicians, AIHA staff and partnership information coordinators discussed the value added from the development of the 58 partnership Learning Resource Centers (LRC) in the NIS and the need to promote greater integration of information systems within partner institutions.

"When AIHA first started talking about information technology over three years ago, I had doubts about the benefits of investing in this area," said Vasily Gogulenko, chief physician of Odessa Oblast Hospital in Odessa, Ukraine. "However, AIHA's work with the LRCs has shown me that my initial impressions were wrong," he said. In the past year, partnership information coordinators have developed one of the first local area computer networks in Ukraine, enabling greater communication among staff.

Sergei Denisov, vice-rector of Minsk Medical Institute, Minsk, Belarus, said that the development of information technology systems and the promotion of evidence-based medicine in his institute "has had a positive impact" on patient care and hospital costs.

Creating the Role of Chief Information Officer

Martin Saggese, AIHA associate director for administration/chief financial officer, introduced the idea of developing chief information officer (CIO) roles within partnership institutions to oversee hospital-wide information departments.

"Partner hospitals in CEE and the NIS are acknowledging their need for computer networks, electronic patient records systems, pharmacy management systems, and hardware/software to support those systems. And that is an agenda that requires staff and resources to implement over a period of several years, under the direction of a chief information officer," Saggese said.

The CIO is a new position, both in US and NIS hospitals, that serves as a liaison between clinical and administration departments and information technology. During a site visit to Grady Health System, participants met with Bill Wilson, chief information officer, to learn how the position of CIO functions at Grady.

"Physicians don't necessarily come up with the necessary information resources in a timely manner," said Wilson. "The role of the CIO is to quickly find the information that physicians and other health professionals need," he said, adding that this information is essential for evidence-based decision making, clinical research and maintenance of information on the latest scientific advances.

As the CIO at Grady, Wilson oversees the implementation of hospital-wide electronic record systems which incorporate information from clinical departments, laboratories, financial and billing departments, and the admissions department. A tour of the hospital demonstrated how these systems are used by physicians, nurses, administrative staff and lab technicians before, during and after the course of treatment to facilitate patient services.

Over the course of the next few months, NIS information coordinators will work with AIHA staff to develop plans for expanding use of information technology within their hospitals. This winter, information coordinators in a number of NIS institutions will join with other key hospital staff to analyze technology needs through written questionnaires and structured interviews.

Integrating the Internet Into Clinical Practice

To demonstrate the importance of using Internet-based resources, information coordinators presented an array of Web sites and data bases to enhance learning for physicians and administrators. For example, Andrei Ureche, information coordinator for Republican Clinical Hospital in Chisinau, Moldova, told participants in a session on anti-microbial drug resistance

about finding information from the *American Journal of Infection Control* and CDC's National Center for Infectious Diseases on the Web.

"When you have to start looking for ways to treat your patients without waiting for your lab, you can turn to the Internet," he said. "I'm convinced, no matter what you're looking for, it's on the Internet somewhere."