Highlights From the 2002 American Medical Informatics Association (AMIA) Symposium -- Biomedical Informatics: One Discipline

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The Need for Electronic Medical Records in Primary Care

Disclosures

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Primary care physicians who met at this year's American Medical Informatics Association (AMIA) conference, held November 9-13, 2002, in San Antonio, Texas, are bracing for the growing tide of information overload in patient record keeping. Faced with expanding regulations, greater reimbursement bureaucracy, and increasingly slimmer profit margins, primary care physicians are increasingly dependent on the electronic medical record (EMR) system, explained members of the National Alliance for Primary Care Informatics, formerly AMIA working group Primary Care Informatics Working Group (PCIWG). Members of the working group came together to share ideas and strategies for increasing the presence of informatics in primary pare by focusing on the urgent need for the implementation of EMR systems in primary care. Primary care physicians are confronted by unique challenges and consequently have needs that differ from inpatient and specialty practice settings. Providing care in a variety of settings, from busy offices to nursing homes, and sometimes even house calls, primary care physicians are busy and mobile, and EMR systems must meet those needs.

The United Kingdom, Australia, Sweden, and The Netherlands are countries where government financing of EMRs has resulted in the vast majority of practices using them. According to a Harris poll, "The proportions of primary care physicians who were (sometimes) using EMR's were 17% in the U.S., 16% in Canada, 25% in Australia, Sweden 42%, The Netherlands (47%), 52% in New Zealand and 59% in the UK."[1] In contrast, primary care in the United States is a cottage industry with one third of practitioners in solo practice. Given the slimmer profit margin and lack of government support, the risk involved in EMR systems is perceived by many primary care physicians to be greater than the benefits. However, upon closer inspection, the benefits are many and would greatly improve healthcare delivery and practice management.

While there are financial savings that can be achieved with the implementation of an EMR system, there are other benefits as well. The panel highlighted several areas of savings. For example, "with an electronic record, physicians can easily 'pull' charts themselves and enter notes directly into the system. The average practice spends $6,783 per year, per full-time equivalent (FTE) physician on medical records staff. Another $5,891 per physician goes to transcribers," according to the Medical Group Management Association's Cost Survey: 2001 Report Based on 2000 Data.[2] Communication between providers is increased, thereby improving the coordination of care. Referrals can be made more easily, and, with more extensive and accurate information, both the referring physician and the specialist have access to the patient's

complete information as well as the results of the referral. Accessibility is enhanced, with EMRs providing access to simultaneous users in disparate locations on a round-the-clock basis. Medication errors can be reduced by the improved legibility and, with the additions of reminders and alerts, an even greater reduction can be seen. More accurate information can also lead to increased billing and the recovery of lost revenue.

Though the benefits of the EMR system are immense, there are numerous issues that must be addressed in order to achieve the greatest value, cautioned the panel. The return on investment is excellent, though it is dependent on setting. For example, barriers to EMR implementation are perceived as being the greatest in primary care settings. One fear is an increase in malpractice litigation. Additionally, there is a fear that the system will interrupt practice workflow. The time to implement and learn the system is seen as a barrier; however, the successful implementation of an EMR system depends on dedicated users who optimize the system to suit their practice needs.[3] The PCIWG of AMIA, composed of members of the panel at AMIA along with many other members, has worked to address the implementation of EMRs in primary care. Since 1999, PCIWG has been working for a solution to the lack of EMR systems in primary care. Observing that primary care is a very fractious environment, the group identified the need for a national strategy for primary care information technology. Indeed, the PCIWG mission statement asserts, "Every primary care provider will use information technology that includes electronic health records with the ability to access and communicate needed clinical information to achieve high quality, safe, and affordable health care." The best way to achieve this goal is to provide "one voice," a centralized and coordinated effort of diverse groups to champion the cause of EMR implementation in primary care settings.

Developing a consensus is the first step in promoting a national strategy for increasing information technology opportunities for primary care physicians. The group offered some specific recommendations to achieve this goal. Providing zero-interest loans for EMR implementation would help alleviate the fear of losing money. Increasing reimbursement for those practitioners using EMRs would be a further incentive for implementation. The US Department of Health and Human Services should endorse HL7 (Health Level 7) as a core standard. Additionally, the federal government should mandate consistent standards and vocabulary. The federal government should fund the implementation as well as pilot studies of EMR systems. The requested amount is $20 million, a sum equivalent to monies spent in other countries where EMR use is widespread. Following the findings of the recent Institute of Medicine report, "Leadership by Example: Coordinating Government Roles in Improving Health Care Quality,"[4] the federal government should use its resources to increase quality and safety of patient care.

For further information about this AMIA presentation, visit the AMIA 2002 Web site. Information about the PCIWG can also be found on the AMIA Web site.

References

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