Health IT at AHRQ
AHRQ's health information technology (health IT) initiative is part of the Nation's strategy to put information technology to work in health care. By developing secure and private electronic health records for most Americans and making health information available electronically when and where it is needed, health IT can improve the quality of care, even as it makes health care more cost-effective. The broad mission of AHRQ's health IT initiative is to improve the quality of health care for all Americans. The Agency has focused its health IT activities on the following three goals:

• Improve health care decisionmaking.
• Support patient-centered care.
• Improve the quality and safety of medication management.

To address the mission, AHRQ has invested over $260 million in contracts and grants to over 150 communities, hospitals, providers, and health care systems in 48 States to promote access to and encourage the adoption of health IT. These projects constitute a real-world laboratory for examining health IT at work and aim to achieve the following:

• Help clinicians provide higher quality, safer health care.
• Put the patient at the center of health care.
• Stimulate the implementation of health IT, especially in rural and underserved areas.
• Identify the most successful approaches and barriers to health IT implementation.
• Make the business case for health IT by evaluating costs and benefits.

Transforming Health Care Quality Through Health IT (2004-2008)
AHRQ has awarded over 100 grants totaling $118 million to promote access to health IT by helping communities, hospitals, providers, and health care systems to plan, implement, and demonstrate the value of health IT.

Planning grants to support community-wide and regional health IT systems by:

• Developing shared registries, electronic health record systems, and telemedicine networks.
• Integrating clinical data from a variety of health IT systems, including pharmacy, laboratory, and public health organizations.
• Redesigning clinical workflow to improve patient care and provider access to information.
• Creating novel methods for delivering information to providers.

Value demonstration grants to evaluate how the adoption of health IT will:

• Impact quality, safety, and resource use in large, integrated delivery systems.
• Advance the effectiveness of Web-based, patient education tools.
• Improve patient transitions between health care facilities and their homes.

State and Regional Demonstrations in Health IT (2004-2009)
AHRQ has awarded contracts totaling $30 million to the States of Colorado, Delaware, Indiana, Rhode Island, Tennessee, and Utah to develop statewide and regional networks allowing health care providers, laboratories, pharmacies, major public and private purchasers of health care, hospitals, ambulatory care facilities, home health care providers, and long-term care
providers to use health IT to communicate and share information. The goals of these projects are to:

- Identify and support State and regional data sharing and interoperability activities.
- Demonstrate measurable improvements in the quality, safety, efficiency, and/or effectiveness of care resulting from clinical data exchange.
- Identify successful strategies for the sustainability of health information exchange.
- Identify programmatic linkages to other key regional and national health IT initiatives.

**Ambulatory Safety and Quality Program (2007-2011)**

Through its Ambulatory Safety and Quality program, AHRQ is funding a variety of projects that are focused on improving ambulatory care through the use of health IT. Specifically, this program seeks to:

- Enable the evaluation or development of new health IT strategies in ambulatory care settings that assist clinicians, practices, and systems to measure the quality and safety of care.
- Improve outcomes through more effective decision support, medication management, or care delivery.
- Investigate approaches for using health IT to create or enhance patient-centered care.

**Clinical Decision Support Demonstrations (2008-2012)**

AHRQ awarded $5 million for two contracts that will focus on the development, adoption, implementation, and evaluation of best practices using clinical decision support (CDS). The Brigham and Women’s Hospital in Boston, MA, and Yale University School of Medicine in New Haven, CT, have each been awarded 2-year contracts to conduct CDS demonstration projects that will:

- Incorporate CDS into electronic medical records that have been certified by the Certification Commission for Health IT.
- Demonstrate that CDS can operate on multiple computer systems.
- Establish lessons learned for CDS implementation relevant to important stakeholder health care communities.
- Assess potential benefits and drawbacks of CDS, including effects on patient satisfaction, measures of efficiency, cost, and risk.
- Evaluate methods for creating, storing, and replicating CDS elements across multiple clinical sites and ambulatory practices.

**Electronic Prescribing Pilots (2005-2007)**

In partnership with the Centers for Medicare & Medicaid Services (CMS), AHRQ funded five pilot projects that implemented and tested initial electronic prescribing standards proposed by the Department of Health and Human Services (HHS). These projects also tested e-prescribing interoperability with HHS-endorsed standards as well as clinical and economic outcomes.

- RAND focused on physicians in an e-prescribing program sponsored by Horizon Blue Cross Blue Shield of New Jersey. The pilot also involved Caremark’s mail-order pharmacy and Walgreens’ retail pharmacy, so that it could include end-to-end testing of the standards.
- The Brigham and Women’s Hospital worked with physicians from the CareGroup Health System in Boston who were already using well-established outpatient electronic medical record and computerized physician order entry systems. This enabled them to isolate the effects of the standards on the operation of existing e-prescribing practices.
- Achieve, the largest information technology vendor for the long-term care industry, partnered with a nonprofit long-term care systems in the Midwest that also owns the pharmacies that serve its facilities and RNA, a pharmacy management system software vendor. This pilot study implemented e-prescribing in facilities that had never used the technology.
- University Hospitals Health System and Ohio KePRO, the Quality Improvement Organization, teamed to study the implementation of the standards in some of the primary and specialty care offices that make up the University Hospitals Medical Practices. These physicians are generally in small practices of two to three doctors.
- SureScripts®, the Nation’s largest provider of e-prescribing networking and certification services, worked with physician offices in Florida, Massachusetts, Nevada, New Jersey, and Tennessee using a variety of software systems to send prescriptions to an assortment of chain and independent pharmacies.

**Health Information Privacy and Security Collaboration (2005-2009)**

The privacy and security of health information is important to patients whose information is electronically exchanged during care delivery. To better protect patient privacy, AHRQ, in conjunction with the Office of the National Coordinator for Health IT, provided $26 million to fund the Health Information Privacy and Security Collaboration. The collaboration includes 53 States and one U.S. territory and is managed by RTI International. The collaborative is working to examine how health care organizations and public agencies currently protect the privacy and security of health information. The collaborative is also examining areas where State and Federal law may need to be updated to enable greater exchange of health information while ensuring privacy and security, especially when information is shared across State