

Quality Health Network
OVERVIEW

Background

Located in Grand Junction, CO (Mesa County) Quality Health Network (QHN) is a non-profit quality improvement collaborative founded in 2004 by four tax exempt non-profit organizations (Rocky Mountain Health Plans (RMHP), Community Hospital, St Mary’s Regional Medical Center, and Hilltop Resources) and the Mesa County Physicians Independent Practice Association. The entities contributed \$2.75 Million in seed capital into a "Healthcare Development Fund". A steering committee was formed to consider alternatives. It was determined that clinical data exchange offered the highest returns and subsequent efforts have been directed at this single project.

QHN Executive Summary

Like many communities, Mesa County and Western Colorado providers find themselves "stove-piped" inside independent organizations inhibiting communication, reducing the efficiency as well as efficacy of care. Physicians as well as other healthcare providers cannot effectively share information well because a high percentage of their data lives in paper charts in the offices directly rendering the care. Even providers (and payers) who possess volumes of electronic data have housed that data in proprietary, internal systems that lack interfaces for external access. **Quality Health Network’s goal** is to break down these barriers in order **to improve the health of area residents, improve efficiencies by eliminating redundancies, and increase provider and patient satisfaction.** Compared to many markets, Mesa County has made exceptional strides to date in breaking through some of these barriers, however that process is still in its infancy with more to be accomplished among the counties of the Western Slope of Colorado.

OUTCOMES/GOALS	
<i>General- Improved Quality of care and cost efficiency through complete integration of the data available in the medical community</i>	
<p>DELIVERABLES:</p> <p>Clinical Messaging System linking all area healthcare participants together to create a virtual Integrated Delivery System from independent disparate providers.</p> <p>Hybrid Federated community-level database of patient medical histories available to authorized and authenticated physician/hospital providers</p>	<p>ANTICIPATED BENEFITS:</p> <ol style="list-style-type: none"> 1. Population-based (esp. longitudinal) disease management/tracking 2. Automated QM compliance (e.g. HEDIS) 3. Quality Metric Reporting 4. Elimination of redundant diagnostic testing/patient work-up 5. Reduction of medical errors (e.g. adverse drug interactions) 6. More efficient integration of medical resources

QHN’s system uses components of an established real-time electronic distribution model provided by Axolotl Corporation to identify, collect, and distribute clinical data from across the community to providers of record. Clinicians and others are able to take appropriate actions

using this information, to enable a wide range of improvements in the patient safety, quality, and efficiency of our health care delivery system.

QHN collects clinical data from many disparate sources and delivers that clinical data in real time pursuant to physician order. Sources of clinical data may include acute care facilities, surgical centers, emergency departments, and ambulatory physician practices. Other entities connected via the QHN data exchange include home health agencies, extended care facilities, safety net providers, hospice, durable medical equipment, urgent care facilities, and many other clinical medical sources. Data transported include diagnostic lab and radiology exams, in-office and acute care progress/encounter notes, transcription, registration data, radiology and a wide variety of physician/patient encounter documentation. Reports and documentation of various types may encompass emergency department reports, out-patient surgery center reports, discharge summaries, medication lists, ambulatory physician practice progress notes, pharmacy “fill” information as well as public health department data.

QHN participants are provided with secure access to browser-based electronic tools to facilitate sharing which include Electronic Clinical Messaging, Electronic Medical Record (Lite) capabilities, Electronic Prescribing, Lab Ordering, Electronic Referral and Authorization Systems, Electronic Chronic Care and Population Management Tools, and Immunization and other Preventative Registry/Tracking modules. Each input or request for information is authenticated and logged, including the date/time of the data input/request, who sourced/performed it, what they sourced/requested, and which data elements and operations were involved. A usage analyzer tool is utilized for audit and privacy/security compliance purposes.

As of December, 2009, ninety one provider organizations (approximately 85% of Mesa County physicians) utilize QHN services. These organizations include more than 1,686 online healthcare users (409+ providers), 780+ fax contacts, and more than 250 pharmacies all of whom are “connected” via the network. Since QHN began operating in late 2005, more than 550 million requests have been serviced by the QHN infrastructure in Mesa County. The shared Common Patient Index lists over 400,000 area patients.

QHN reports quality metric data pursuant to physician agreement to Rocky Mountain Health Plans which is used for population management, care coordination, and pay for performance purposes.

QHN is expanding its network to twenty western Colorado counties with funding help from The Colorado Health Foundation. The multiyear long term project will electronically integrate 18 rural hospitals (most are critical access facilities) and 948 physicians in western Colorado with the result that health data for the 446,423 residents in twenty counties can be shared by treating health care providers wherever a patient presents for care--improving the quality of care received, reducing errors, decreasing costs, and increasing the probability that the right care is provided at the right time.