WHITE PAPER

MHIF
RURAL HEALTH
Transformation Center

In partnership with:
Allina Health

Rural Health Care Transformation: Achieving Access, Value and Health Improvements with a Data-driven Model

The U.S. Department of Agriculture Economic Research Service estimated that as of July 2015, there are 46 million people, or 15 percent of the country's population, living in rural America.[1] Socio-economic factors are creating a higher burden of chronic illness, and therefore a lower life expectancy, for these rural American citizens. In fact, according to a study from the Centers for Disease Control and Prevention published in January 2017, rural Americans are more likely to die from heart disease, cancer and the three other leading causes of death than their urban counterparts.[2]

For those who care about the future of rural America, the challenge that lies ahead for rural health care systems is clear. To successfully transform from simply *surviving to thriving*, we must start with the Triple Aim, and examine how we define success, not only in our health care system, but also in the overall health status of our communities. This begins with a vision, and for rural population health, that vision is to realize the full health potential of our communities by leading and innovating in access, value and health improvements as proven by our outcomes.

While rural areas have distinct strengths and challenges related to health care, the scale tips toward the strengths, which include the patient experience, performance on quality measures, employee and physician engagement, cost efficiency, early adaptation of medical homes, community relationships and support. However, low volume, scale and the specialization of health care can all create challenges.

Thus, transforming rural health to realize the full health potential of rural communities requires a multi-layered strategy. Leadership and innovation in access, value, health improvements, outcomes monitoring and data analytics are all critical ingredients for success in achieving the Triple Aim of improving the care experience (quality and access), increasing value and affordability, and improving population health outcomes.[3]

In this white paper, we look at the goals of the Triple Aim within the context of a rural health care system and discuss critical considerations for pursuing a data-driven model that can lead to success.

About the authors

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Cindy Winters

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Is your organization truly pursuing goals of The Triple Aim?

There is a difference of stating that the Triple Aim is important and actually pursuing the Triple Aim. Rural health care systems must ask if their organizational strategy, their resources, the allocation of their budget and their data analytic strategy actually tie to the Triple Aim.

What is the quality, experience and access of your care system? Successes such as reducing mortality from sepsis, lowering readmissions or improving cancer screening rates are commendable. While there are many success stories occurring across the country related to the quality, experience and access goal, the other two goals are more challenging.

What is the affordability of your care system? A wide-angle view of affordability must look at factors well beyond the costs of procedures or an urgent care visit. Affordability of your care system must consider affordability for various constituents, including a patient, a family, an employer and a population group, as well as your government payers. Regional system partnerships are one way to boost affordability efforts. For example, participating in an Accountable Care Organization (ACO) Program through the CMS Next Generation ACO Program, or creating a commercial network health plan where members are able to save 10 percent on premiums are both ways to significantly impact affordability. We must also consider how affordable the care system is over the course of the year, whether it is improving over time, and how it compares to competitors in order to determine true affordability.

As the transition from volume to value continues to gain traction in the industry, we must recognize the central purpose for that transition, which is to achieve affordability. Volume to value for affordability is needed today more than ever, and affordability of your care system must consider two goals: 1) to generate an operating margin that enables reinvestment in both the current and future system of health care delivery, and 2) to ensure the health care system is affordable for the community. It is equally important that the system embraces these goals wholeheartedly.

In other words, if your care system can pay its health care bills, but your community members can't pay their bills, that's not success. This "value agenda," as described by Michael Porter and Elizabeth Teisberg in *Redefining Health Care*, can be phrased another way — if our health care solutions are not affordable, then they are not solutions.[4]

What is the health status of your community? Answering this question must go beyond generalities such as acknowledging a high rate of smoking, obesity, mental illness or addiction, etc. To answer this question, health care systems must examine the health status of their community from many angles. They must work in partnership with their community to help shift health as a priority for the local government, organizations, social services and businesses. Health care leaders must also be knowledgeable in how to pull relevant data; use it to influence policies, systems and environment solutions that support health; reflect back on how health data can influence community change; and use data to unequivocally to set solid annual goals and show progress compared to baseline.

A successful partnership

Together, New Ulm Medical Center and The Minneapolis Heart Institute Foundation were collaborative partners in the award-winning population health initiative called Hearts Beat Back: The Heart of New Ulm Project, in the rural community of New Ulm, Minn. from 2009 to 2018. The project, which continues today as a community-owned initiative, began as a 10-year population health demonstration project that combined the foundation's unique research strengths with the commitment of a rural health care system to build a data-based model with real-world implementation and monitoring.

The initiative offered a unique environment for studying how various population-based interventions can impact the health of an entire community. In 2018, it won the Heart Healthy Stroke Free Award from the National Forum for Heart Disease & Stroke Prevention; in 2014, it won the prestigious 2014 NOVA Award from the American Hospital Association and also the Community Benefit Award (small hospital category) from the Minnesota Hospital Association. That year it was also chosen as one of 10 partnerships from among more than 160 nominees to be included in a study of successful collaborative partnerships focused on improving community health by the University of Kentucky's College of Public Health in conjunction with Commonwealth Center for Governance Studies, Inc.

FEATURE DOCUMENTARY

A 20-minute documentary, produced by Health Catalyst, highlights the importance of The Heart of New Ulm Project from a national health care perspective.

Watch it online at www.tinyurl.com/TransformNewUlm

Innovation necessitates a bold vision, resource-rich mindset

To be truly innovative in health care and create sustainable changes for impact, there are two requirements: 1) a bold vision that compels an organization to make transformational change, and 2) the embracing of a mindset that the organization is already resource rich.

The second requirement has traditionally been very difficult in health care, as the solution to problems has typically involved developing a business case for more full-time employees or additional investments. For decades, organizations have determined their spending budgets first — and **then** figured out how to generate a revenue source through a growth in services and pricing to be able to spend that amount of money. To begin embracing a resource-rich mindset instead of facing a scarcity of resources, organizations must ask, "What assets or resources do we already have today that can be applied to the challenges?" This sets the stage for transformation and innovation to happen and truly improve population health outcomes.

The following three-pronged population health model can apply regardless of whether the system is in a rural or urban area:

1. **Integrate the local health care system across the continuum and across the community.** Without integration, fragmentation of services results in dissatisfied patients, decreased patient safety and lack of communication among the care team, which all lead to increased costs. Strong integration, on the other hand, improves handoffs and communication, resulting in seamless care for the patient and increased patient satisfaction.

2. **Leverage the resources and expertise of a regional health system — and understand the real value in doing so.** Often independent hospitals and independent providers view leveraging the benefits of a regional system in the wrong light. Due to concerns that the business environment is too daunting, independent providers may opt to join the regional system for access to capital or to leverage economies of scale from larger buying relationships. However, in doing so, they miss the real value. The value in being part of a regional system lies in the ability to expand, elevate and enhance the care for the local community.

Neutralizing geography with a highly integrated system

It's easy to think about the future of health care in our country and needed solutions by looking for answers within large hospital systems, tertiary care centers and trauma centers. Rural providers are often considered somewhat of an afterthought. Some may question whether rural provider systems are even going to be important enough to maintain into the future, but if examined from a population health standpoint, the data tells a different story.

A look at New Ulm, Minn., may be representative of rural communities across the country. According to New Ulm Medical Center (NUMC) data, only 3 percent of community residents in 2017 will spend a night in a tertiary care hospital or trauma center.[5] This necessitates looking at the remaining 97 percent of the community that the care system takes care of and asking what they need. The answer is clear — they need a highly integrated, comprehensive, local health care delivery system.

In a highly integrated system, clinics, hospital, home care, hospice, mental health services, substance abuse, and retail pharmacy are highly connected, with a shared vision, shared purpose, and a shared goal at a community level serving that population. In New Ulm, when the 3 percent exceeds its ability to take care of patients locally, the hospital aims to make a seamless transition by using its flagship Abbott Northwestern Hospital 100 miles northeast in Minneapolis. Abbott has created Centers of Excellence in areas such as cardiovascular health, neuroscience, orthopedic and mental health, which are all focused solely on bringing in patients from across a wide geographic area.

NUMC tries to make the transition seamless with the help of a common electronic health record and implementing telehealth and care coordinators. For example, when a patient arrives at the hospital's ER suffering from symptoms of a stroke, within five minutes the stroke neurologist from Abbott Northwestern is brought in via telehealth to partner with the ER provider. Together the team initiates the protocol and CT scans, determines whether to administer Tissue Plasminogen Activator and looks to the neurologist to help guide the overall care. Another example might be a cancer patient, where perhaps a certain portion of their care can't be delivered locally, and care coordinators can be utilized to guide that care along the continuum and back.

With this type of population health model, it's really about neutralizing geography. In other words, to the patient, it does not matter whether he resides in a rural community and needs care from the care system — or resides six blocks away from a flagship hospital. This model of care, complemented by adherence to excellence in clinical service lines, enables systems to enhance and improve care *across the entire system* while still strongly supporting the belief that health care is better when it is local.

3 **Fully engage the community.** A situation where the vision and strategy for a population health model comes solely from the health system is a recipe for failure. The community must support the vision and strategy. A health care organization will know it has hit the sweet spot when it can look across the community and see that health is a shared goal by all. The proof of that can be found in signs such as seeing health as part of the Chamber of Commerce's strategic plan, or in the local school board's strategic plan and budget allocation, or when a local park board makes a community decision about where to locate a new park based on strategic use of available data vs. simply holding a meeting and listening to the loudest voices in the room. Health may be a shared goal by all, but the catalyst must be there to do so. For more insights on community engagement best practices, see the Minneapolis Heart Institute Foundation's publication *Getting to the Heart of It: The Power of True Engagement for Population Health.*[6]

Data analytics: Foundational and transformational

Historically, hospitals have earned a reputation for moving slowly, and restricting themselves by adhering to an operational model that promotes implementing strategies from a three-year strategic plan. For population health success, **data analytics** must serve as the foundation of the model. Data analytics allows for real-time strategic decision-making and planning, based on dynamic and changing conditions, to identify opportunities and measure progress on your plan.

Data analytics is about much more than pulling disparate data sources together into a data warehouse and developing dashboards for various accomplishments, such as sepsis care or total joint replacements. While easy to do, it's critical not to fall into a trap of simply equating the *existence* of these reporting tools and a system with success.

Rather, as a health care leader, you can directly influence the future outcomes for rural health care by the strategic questions that you ask, and how well you align your data analytics to your system vision, strategy and operational planning. With a data analyst sitting just outside your office, you can begin to guide your health care system well beyond strategic planning based on a three-year cycle.

Every day becomes an opportunity to assess how well your strategies are working, and whether they are indeed improving outcomes. With real-time data readily accessible, you can begin to answer the question, "How do we redefine our operational plans to maximize the impact for the patients we serve … for the communities that we serve?" To achieve the vision, organizations must assess who is asking the strategic questions of data analytics, and whether they are the *right* strategic questions. A strategy will never help a system get the outcomes it needs for the organization — or for the community — if it does not have the data and information to help guide and support it.

ENGAGEMENT LEARNING GUIDE

"The Power of True Engagement for Population Health" learning guide was created by Minneapolis Heart Institute Foundation's population health team, in conjunction with AcademyHealth.

Download it at
https://tinyurl.com/EngageCmty

Examples of transforming data into information and strategy

Primary care relationships

Consider an organization with the strategic question of how and where it could add 5,000 relationships over the next five years. The data process may begin with electronic health record data on the clinic's patient population, which can then be merged with census data from a public source, employer data and maps. Very quickly, the organization can begin to see information that can help guide its strategy. It can break down market share by community and where it might be able to build upon relationships using regional strategies, convenience care strategies and employer strategies to reach that goal of adding 5,000 primary care relationships. Without taking the data and getting it to the stage of information and strategy, attainment of such a goal would not be possible.

Specialty care integration strategy

Consider an organization that is looking for opportunity to improve access and alignment with its specialists — something that is vital in the fee-for-service environment and even more so in a total cost of care environment. The organization can begin by looking at data sources through the lens of revenue and where it may have opportunities to improve access and alignment. By breaking down data at the physician specialty level — or at the diagnosis and the clinical service line level — the data can then be tied to a primary care provider census database to create a roadmap. The organization can use the roadmap to inform it on recruiting needs, opportunities for telehealth, and how to enhance care integration with primary care clinics to drive up specialty care. For example, a data map might show how many people needed a total joint replacement and how many of them had a primary care relationship with the local system, but went to a different system for their total joint replacement.

Financial goals

Consider an organization with goals to increase revenue and improve affordability — potentially at the same time. While a common belief may be that this is simply not possible, harnessing data and connecting it to strategy and outcomes may hold some potential for success in this pursuit as well. Take the case of an organization that starts with data related to payer claims and revenue sources, and then combines this with clinical data and diabetes outcomes. Patterns soon become evident related to utilization characteristics and statistics across the population for ER visits and MRI and CT use. For example, the data may show that in the rural health care system, a bundle total joint replacement is $13,000 for a 30-day episode in the Medicare program, yet $32,000 at a system 30 miles away.

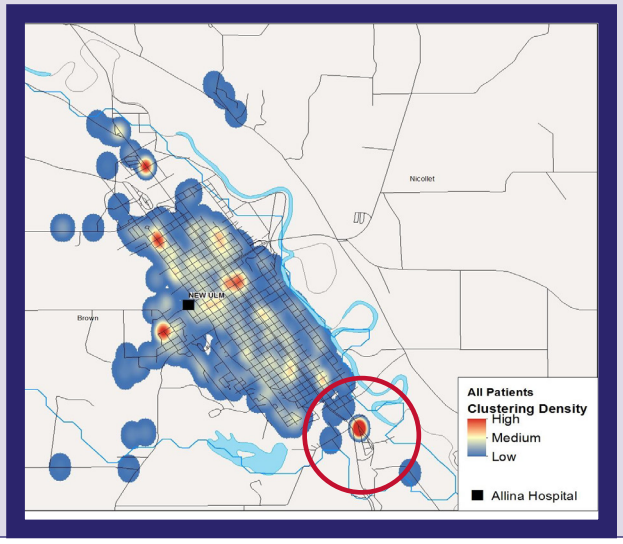
Looking at the information from its Medicaid plan, the organization can see all the variation that occurs along with the inappropriate care due to lack of integration. It begins to lead with provider education, builds in care coordination, adds a social worker in the ER, and within three consecutive years, achieves a 40 percent reduction in ER visits and resulting hospital admissions each year.

The key is helping connect people to community resources rather than just providing additional medical care in the system. The system reaches out to its brokers and employers to serve as the provider for wellness and safety improvement. In turn, it helps with a health plan that achieves 10 percent plan savings for the commercial health plan for businesses and individuals in the community, and at the same time increases its net revenue by 20 percent.

Chronic illness and improving the health of the community

Consider an organization that wants to determine where health opportunities exist across the community. Data collection may begin with electronic health records and, for example, registries for diabetes, depression or asthma. Add in quality reports on smoking, weight and other important indicators, and it's possible to create maps that can drive reporting at the provider level, clinic level, or by socio-economic factor. It allows an organization to see where disparities exist in the community and then begin work on plans to improve them.

Why is this so critical? Frankly, it's because it would require an army of care coordinators to approach and figure out how to help a community of 30,000 people. By stratifying the risk of the population and helping care coordinators hone in on where the need is greatest, they can reach out. The team care model in the clinic can also help improve all of those outcomes and maximize the potential of each clinic visit.



Sustaining outcomes

To be successful with population health requires not only attaining positive health outcomes, but obviously sustaining those outcomes. A three-pronged approach:

1. **Educate individuals, families, businesses and your community about their current health care status.** Raise health literacy by helping individuals understand their risk factors and what they can do to improve their health status.

2. **Define roles and responsibility all across your community.** What is the role of the Chamber of Commerce, of the public health department, or of the school system as it relates to health as a shared goal by all?

3. **Empower your community.** Health care systems must realize that while it is their role to provide services and programs and to reach out into the community, their future role must also entail equipping other organizations to lead in improving the health of the community and the population. Provider systems must develop programs, but must also build a community leadership team to ensure the work is truly community driven.

For rural health systems and health care in general, there are indeed great challenges ahead. However, if the solution doesn't start with a population health focus, systems and communities alike will forever face the reality of being disappointed in the outcomes. By pursuing an innovative, data-driven model for population health, rural health systems can indeed achieve The Triple Aim goal of value, access and health improvement proven by outcomes. ●

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The Minneapolis Heart Institute Foundation® is a research and education foundation that aims to create a world without heart and vascular disease.

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Our Vision

To simplify and accelerate rural community health improvement efforts for sustainability and impact.

Connect With Us at the MHIF Rural Health Transformation Center!

For more information on how our community rural health consulting services can help you, please contact us:

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