The Value Quadrant of Healthcare Reform

A Roundtable Discussion

Summer 2009

Panel Participants

Opening by

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Founder and CEO, Health Technology Center (HealthTech)
HealthTech is a nonprofit research organization and expert network that develops forecasts and planning tools for emerging technologies in healthcare

Moderator

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Chief Executive Officer, Pharos Innovations
Pharos Innovations improves care coordination and chronic care management and drives dramatic clinical improvement and cost savings through a unique device-free remote monitoring platform

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Executive Director and Senior Advisor, Health Technology Center (HealthTech)
HealthTech is a nonprofit research organization and expert network that develops forecasts and planning tools for emerging technologies in healthcare

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Iowa Medicaid Enterprise is an endeavor that unites state staff and "Best of Breed" contractors into a performance-based model for administration of the Medicaid program

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Founder and Director, Center for Connected Health, Partners HealthCare
The Center for Connected Health, a division of Partners HealthCare, is creating effective, new solutions and innovative interventions to deliver quality patient care outside of the traditional medical setting

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President, DMAA: The Care Continuum Alliance
DMAA: The Care Continuum Alliance convenes all stakeholders providing services along the care continuum toward the goal of population health improvement

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Professor and Chair, Rollins School of Public Health, Emory University and Executive Director, Partnership to Fight Chronic Disease
The Partnership to Fight Chronic Disease is a national coalition of more than 85 patient, provider, and community organizations, business and labor groups, and health policy experts committed to raising awareness of the number one cause of death, disability, and rising healthcare costs in the U.S.: rising rates of preventable and treatable chronic diseases

Introduction

According to the Partnership to Fight Chronic Disease 2009 Almanac of Chronic Disease, "Chronic illnesses — ongoing, generally incurable illnesses or conditions, such as heart disease, asthma, cancer and diabetes — are among the greatest threats to Americans' health. More than 133 million Americans, or 45 percent of the population, have at least one chronic condition… Chronic diseases also compromise the quality of life of millions of Americans."

Chronic disease is a problem that many physicians see daily in their clinical practices, and one that causes countless unnecessary and avoidable hospitalizations. This problem exists for reasons that largely reflect a lack of simple coordination of information and care processes, as well as a lack of programs and approaches for patients with chronic disease to become more involved in their daily self-care and monitoring of early clinical deterioration.

At the 2009 Medicaid Congress and National Medicare Readmissions Summit held June 1-2, 2009, in Washington, D.C., Pharos Innovations hosted a panel discussion of healthcare experts to discuss these complex issues. The lively and provocative conversation centered on the large opportunity that exists to dramatically reduce healthcare costs in chronic disease populations while improving quality of care and quality of life, using simple, scalable solutions and models that have already been well-proven.

The Value Quadrant of Healthcare Reform

BY RANDALL WILLIAMS, MD, FACC
CEO, Pharos Innovations

One of the challenges of the current healthcare reform effort underway in Washington is that we all come to the discussion biased by our experience and background. At this event, we have an opportunity to hear from a variety of stakeholders discussing their approaches and philosophies about healthcare reform.

Chronic disease constitutes our nation's largest health and financial challenge. Today's costs will only escalate as our population continues to age. From our perspective at Pharos Innovations, any discussion of healthcare reform must begin with a focus on what are we going to do differently for chronic disease.

The Four Key Concepts of Healthcare Reform

Today's healthcare reform discussion appears to be centered around four key concepts:

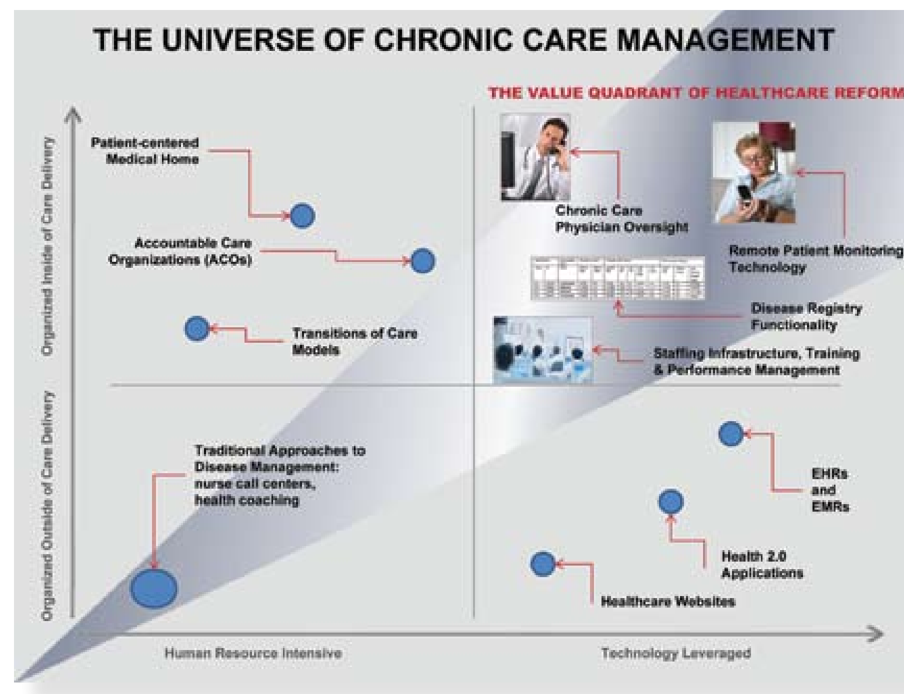
1. Improving access to healthcare
2. Payment reform, in particular re-engineering of provider payment approaches
3. Re-engineering care delivery to better address prevention and chronic disease management
4. Finally, addressing delivery system challenges that improve the coordination of care and address the complex relationships between patients, physicians and payers

These last two discussion points are the most interesting and the most challenging, completing what we call the "Value Quadrant of Healthcare Reform" (VQHR).

The Value Quadrant of Healthcare Reform

To understand the direction we believe healthcare delivery reform must go, let us first take a look at where we have been. In the bottom left-hand quadrant of the VQHR diagram below you see our "glimpse in the rearview mirror."

We know that by targeting chronic disease at a health plan level, from outside the care delivery system as we have in the past, and utilizing a human resource-based model, such as the traditional disease management call center approach, we tend to see higher cost models with modest impact potential. The jury is still out in terms of how big that impact is, but clearly the models of the past decade set the stage for reform by focusing on better care coordination and chronic disease management.



As we move across the horizontal access, we see an emerging discussion around the potential impact of information technology and a shift away from the human resource-intensive approach to one that is technology-leveraged, proactive and continuous. Early attempts to engage patients with consumer technologies, such as the Internet, and providers with electronic health records, are already underway.

Delivering this kind of technology-leveraged care will be essential if we are to cope with the anticipated future shortfall of physicians and nurses. We must find ways to smartly and efficiently leverage technologies. Done right, information and telecommunications technologies can also serve to engage patients more directly in their own care, and support better communications and coordination.

On the vertical access, we can see the significant shift in care delivery over the past 15 to 20 years. The "system" of care coordination was once organized outside of the point of care delivery, often falling to health plans to organize, but is now shifting to programs organized by the providers themselves. This also includes a pendulum shift wherein health plans are structuring payment models, such as the Medical Home or Pay for Performance, to incent providers to become better organized around chronic care delivery.

The key to reaching the VQHR is to start with a focus on a short list of chronic conditions that, when better managed, have been seen to represent dramatic cost savings opportunities. By targeting an approach to chronic disease that uses health information technology (HIT), the costs of achieving these improvements can be reduced. Formally then, the VQHR is the optimal, technology-leveraged approach to chronic care management that unifies disease registry functionality, care coordination services and remote patient monitoring technology at the point of care delivery for maximum healthcare outcomes and cost savings.

The VQHR is composed of four key modular elements:

- Chronic disease registry functionality that provides insight into a population to track chronic care management progress and target interventions to the right individuals within that population
- Home tele-health and remote patient monitoring technology — simple, ubiquitous technology to raise the level of vigilance on individuals with chronic disease and keep them in better contact with their care team
- Care coordination staffing infrastructure, training and performance management
- Chronic care physician oversight, including provider systems that are organized and incented to deliver chronic care management and have the resources to do it

In conclusion, it is our perspective that the current structures and payment of provider care delivery need to be fundamentally reformed. We cannot simply take today's provider systems, throw money at the problem, and expect a solution. In point of fact, this would lead to more of the overuse and inappropriate use that we see today. The key to success is to incent and reinvent the care delivery system to blend care coordination and technology across the continuum for populations with chronic conditions.

The Technology Shift

BY STEVEN DEMELLO
Executive Director and Senior Advisor
Health Technology Center (HealthTech)

I have three topics tonight. The first comes from reflecting on having been at HealthTech for three years. We are effectively a research organization and a membership organization, so in some ways we become a referendum on what people are thinking about and spending on and trying to evaluate from year to year in technology. We have seen a profound change in the last three years in our own work.

In 2004-2005 we were fundamentally a hospital organization. Then, the world was divided into two parts: imaging and surgical interventional technology and not much else.

Coming into 2009, we find that the vast majority of our work is in remote health services — remote patient monitoring using information technologies — and chronic disease management. We have migrated very far away from both the original sponsors through the hospital and the original technologies. We don't believe this is coincidental.

The second is trial fatigue, as you'll hear Dr. Thorpe speak about. We also see this in stages across many of our organizations. The most memorable conversations we have are with groups where you gather ten people in a room, take a subject and ask: did you try this; have you bought this; have you tested this? And every answer you'll get around the table is yes. We have heard about it, seen it, talked to the person, hired the person, we did the trial. Then the next question is always: have you been able to take it to any sort of reasonable scale? At which point you get that silence.

Most organizations, even when they do get to the stage of doing a successful trial, have neither the resources nor the corporate will to be able to ask that next question: How do I get the impact not in one institution, but in 30? How do I get the impact not in one market, but in five or ten? And what are the skills and what's the level of investment and the mindset needed to do it effectively?

We find that even within the best organizations the answers are still very elusive but they are probably the most central, important and critical issues particularly for moving remote health technologies — the family of technologies that we think are really at the heart of making the biggest difference in disease management.

The third topic for us is that we go through a process every couple of years of trying to think through what is different about the universe and how we think technology sticks to that universe. In the past year no matter what we talk about and no matter what issues we deal with, we keep coming back to the same central point over and over again. That point is population health, and it has two thrusts.

One is the growth of chronic disease and the aging of the population and the other is a lack of caregivers. No matter what we look at, we always come back to those two physical realities. And, we feel much like the parable of the boiled frog. Take a large pot of water, put a frog in it, if the water is boiling already, the frog jumps out. Take the same pot of water and heat it slowly. If you put the frog in at the beginning, the frog simply stays and dies. It is the same for us in healthcare right now because the differences year to year are not significant; they don't require action.

I think we have two deep fears about healthcare reform today. The first is that we are still sitting in a universe where the big changes are really large, ugly, interesting population and disease dynamics that are creeping up in such a way that people do not grasp the severity of them. The other is that in the rush to learn what meaningful use is and in the focus of investment dollars in a particular aspect of IT, we're going to lose traction and the opportunity to get investments in a number of key areas that promote better patient management and care coordination. We think that it is these investments that represent a path of progress, but do not get the time and the attention that the mainstream HIT world, particularly the electronic medical record world, is getting today.

We see the intellectual movement as being much more towards the kinds of technologies and issues that can really make a difference in chronic disease management. Not to discover it, not to trial it — but to see it in a different way. We think at heart, from a financing and clinical perspective, the current ways don't address how you literally shift care from very high clinical levels right down to that patient and every place in-between — families, communities, lower-level skilled caregivers, higher-level skilled caregivers.

"In the rush to learn… we're going to lose traction and the opportunity to get investments in a number of key areas that promote better patient management and care coordination."

A Glimpse into a Successful Model

BY THOMAS KLINE, DO
Medical Director,
Iowa Medicaid Enterprise

As the Medical Director for the State of Iowa Medicaid Programs, my primary area of responsibility is to oversee medical and pharmacy services.

Until July 1, 2005, the Medicaid Program in Iowa was essentially a payer of claims. Medicaid members had services provided to them and their claims were paid. However, the director at that time felt that there should be more to care — that his members should receive more than what they were getting. Thus the Iowa Medicaid Enterprise was developed.

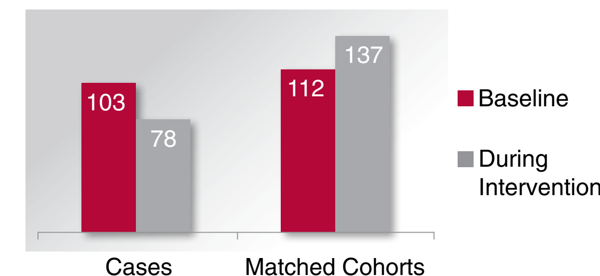
Part of our responsibility for the enterprise was to develop care management programs. We initially tried to build internally. We soon learned that that was not necessarily the best way for us to proceed. We reevaluated and decided to take a community collaboration approach. Two of the entities we collaborated with were the Iowa Chronic Care Consortium (ICCC) and Pharos Innovations. Through our collaboration with the ICCC and through the American Telemedicine Association, we were able to get some funding to develop and implement an interactive, remote patient monitoring disease management program focused on heart failure.

One thing we had learned in the past was that our members were difficult to contact, enroll, maintain and engage in their healthcare. Thus, we relied very heavily upon our partner, Pharos Innovations, to help us with those various functions. Ultimately we were able to achieve our target population of approximately 300 members.

Pharos' technology was perfect for our difficult to reach and engage population because its device-free approach allowed us to reach more people, more conveniently. All our members needed to do to engage into the program was be able to use a telephone, stand on a scale and interact with this remote technology. The system required them to validate their identification, respond to five questions specifically related to the symptomatology of health failure and enter their daily weight. Participants then received a daily health message prior to disconnecting. The really important thing, the magic, if you will, is that immediately if there was a clinical variance, it appeared on the desktop of our nurse care managers. When there was a clinical variance, the care manager was able to initiate or rather quickly call that member to inquire about that variance and determine an appropriate course of action. Oftentimes, they were able to care for those issues with simple interventions. Sometimes it required the assistance of their primary care provider and became a three-way conversation: the member, our nurse care manager and the provider's office. And it worked out very well.

Pharos Innovations believed very strongly that you can put forth the greatest effort, but if you don't identify patients that have depression, the whole system is not going to work. So we instituted a depression screening as part of our initial evaluation and enrollment. Periodically, depending upon their scores and the protocol developed with our behavioral health partner, were able to identify people with clinical depression and refer them for treatment. Subsequently, their condition improved, which made their heart failure treatment more likely to be successful.

At the end of the 12-month period we went through an evaluation process that was approved by the Public Health Policy group at the University of Iowa. That was at the request of the Department of Human Services to make sure that whatever we did was at least budget neutral and hopefully improved quality. Any kind of a reduction in our healthcare costs was a bonus. The methodology we used was also reviewed and sanctioned by the Disease Management Purchasing Consortium.



At the end of the results, we found out (1) we significantly reduced hospitalizations for patients with a primary diagnosis of congestive health failure; (2) we significantly reduced the overall healthcare costs of our patients who were identified with congestive heart failure and (3) compared to a matched cohort, we found that there was a difference of $5 million; $3 million saved by the intervention group, $2 million in excess by the nonintervention group. As an end result we felt we had a very successful program.

24% Reduction in hospital admissions
22% Increase for matched cohorts

More importantly, through this effort, we established a template that we can apply to any chronic disease using the process that we developed relative to our congestive heart failure. We are currently in the process of designing a diabetes disease management program which will also utilize the Tel-Assurance technology to manage diabetes and hopefully have the same outcome and results.

The Center for Connected Health Way — A Hospital System Keeping People OUT of the Hospital

BY JOSEPH C. KVEDAR, MD
Founder and Director
Center for Connected Health, Partners HealthCare

Partners HealthCare is an integrated delivery network. Our anchoring hospitals are the two largest Harvard teaching hospitals, the Brigham Women's and Mass General Hospitals in Boston. We see somewhere around three million patients a year in our network. The Center for Connected Health is a division of Partners HealthCare where we develop and implement a range of effective, new solutions and innovative interventions to deliver quality patient care outside of the traditional medical setting. Our programs use a combination of remote-monitoring technology, sensors and online communications and intelligence to improve patient adherence, engagement and clinical outcomes.

The leadership at Partners HealthCare is very committed to giving back to the community — and to serving as a beacon for important healthcare issues, such as payment reform.

For me, at the Center for Connected Health, it is a perfect environment because we do things that would not be particularly exciting in most hospital systems: we keep people out of the hospital. Quite simply, our strategy is based on the notion that we should provide care where the patient is and when the patient needs it. The technologies that underpin most of our initiatives are monitoring and messaging tools. It turns out that connected health programs can be quite robust and exciting for patients of all age and income groups, and for providers, payers and employers.

We have identified four design principles that we apply over and over. The first is gathering accurate information about patients that is relevant to their illness. That could be blood pressure, strep counts or weight. But it is important that the information is recorded automatically — that it is uploaded and isn't inputted directly by the provider.

The second component is sharing that information with patients in a way that is the most meaningful. This is a really important concept, especially for the really motivated portion of the population — you give them some kind of measurement and they just achieve.

We can engage a whole other group of patients by adding the third component, which is data-driven coaching. Someone to whom the patients are accountable, hounding the patient in a good way, consistently encouraging healthy behavior and adherence. That could be a nurse, it could be a doctor, it could be a nonhealthcare provider. We do a lot with automated coaching — it is one of our most interesting and fastest growth areas.

And the fourth cornerstone for our connected health programs is providing meaningful information to providers, when providers need to be involved. We apply this formula to a variety of chronic illnesses: heart failure, hypertension, diabetes, and we're achieving great results. A couple of trends are emerging, and we're getting a good glimpse into the future of healthcare delivery. I cannot tell you how it is all going to work out because it's still early, and there are a number of issues to be addressed. But we are seeing a couple of very exciting things.

First, given the right tools, patients are really able to take charge, and they really want to. Patients can be very proactive and get involved in taking care of themselves. By providing an environment where they know they are being monitored and held accountable, a large percentage of the population will actually move themselves to healthier behavior. I think that is really important in the context of healthcare reform because there's not enough supply of providers to meet the demand for services.

Our second observation is that the provider's role is changing as well. For example, we have the tele-monitoring heart failure program with a delivery system scale to enroll about 1,000 patients a year. We are going to reach that goal this year. It turns out that the nursing center responsible for that monitoring is in our home care organization. There are three nurses who used to come to work and get their daily assignments, get in their car, drive around and see around five people in a day. Now these same three nurses are monitoring 250 patients on a daily basis using tele-monitoring. Their role has dramatically changed. Even more exciting, an increasing number of our doctors are giving them sliding scale type orders or standing orders. For example, 'If this data pattern is identified through monitoring, you can do this therapeutic intervention; you don't need to call me. Call me if that doesn't work.' And that's really how we're keeping people out of the hospital. We have a 50 percent readmission reduction rate in that particular program.

Which brings me back to healthcare reform. If we're going to seriously implement healthcare reform, these kinds of connected health programs are going to be critical because, again, simply granting more access is not going to solve the problem.

"We should provide care to the patient where the patient is and when the patient needs it."

Healthcare Reform from the DMAA Perspective

BY TRACEY MOORHEAD
President
DMAA: The Care Continuum Alliance

Dr. Williams and I first met in 2005 when I had to convince him that DMAA actually got it, that DMAA as an organization representing the industry was transitioning quite rapidly to understand and better integrate with and provide resources for physicians.

DMAA today is no longer the Disease Management Association of America; we are DMAA: The Care Continuum Alliance. We transitioned to that new name to better represent the full spectrum of our member organizations. Not only do we have population health management organizations providing wellness and chronic care management services, which remain a very important component of the services that our members provide, we also have over 65 health plans, pharmacy benefit managers, pharmaceutical manufacturers, large hospital systems, integrated delivery systems, small and large physician group practices and a variety of health information technology developers and purveyors including remote patient monitoring organizations and companies that manufacture patient monitoring devices, among others.

When you look at the breadth of our membership you can really understand that we are an organization and an industry representing the full spectrum of healthcare and care coordination. This includes coverage of individuals who are healthy and need help staying healthy, who are at risk and need help mitigating their risk factors for developing chronic conditions, those who are chronically ill and those who have complex medical conditions and require special assistance and intervention regardless of whether they are still at home or in an institutional setting.

Our members are providing services along the entire continuum and I'm delighted to be in Washington in this environment talking about healthcare reform because I think, as Dr. Williams mentioned, chronic care management and addressing the risk factors for chronic care management is at the crux of our discussion about healthcare reform today. Not only am I honored to work with Dr. Williams and Pharos Innovations as a member of the DMAA, but I have worked with a number of the other panelists here tonight including Ken Thorpe and the Partnership to Fight Chronic Disease of which we are a very active member.

We have a real opportunity this year to begin to change the delivery system from one that focuses on acute care driven to one that is more focused on preventive-based care. A system that supports the individual patient as well as the physician and coordinates the care of those individuals who are at greatest need. I'm delighted to say that DMAA members do provide services to all of those caregivers and other and provide educational tools for them as well.

I am very fortunate to be here today and I look forward to answering the questions that you have about the benefits of care coordination. I do want to emphasize that in this context of healthcare reform, as we speak to Senate Finance Committee, House Ways and Means and Health Energy and Commerce, it is very important for us to underscore for them the importance of care coordination and maintaining transitions of care. It has been DMAA's focus to them to help them understand that because of the shortages, particularly with physicians and nurses in this country, we need to look to telehealth and telemedicine as very important tools in building successful population health management programs.

"We have a real opportunity this year to begin to change the delivery system from one that focuses on acute care to one that is more focused on preventive-based care."

Putting our Money Where Our Mouth Is

BY KENNETH THORPE, PhD
Professor and Chair, Rollins School of Public Health, Emory University
and Executive Director, Partnership to Fight Chronic Disease

When people talk about healthcare reform, they want to talk about controversy, intrigue, and money and battling. That then leads us into the coverage pieces of financing — is their public plan not a public plan, how are we going to pay for it, etc. Those are all the same issues that have really bottled us up over the years on healthcare reform. Hopefully, that will not happen this time, but certainly it's going to be a major part of the political contention this year.

If we go back to the basics and ask why the industry players are working together on this and focusing on consumer groups, labor and the provider and business communities, I think we will find the answer to be that nobody can do this on their own. Certainly, there are things within our industry that we can do to improve the system but, in essence, the nature of what is driving the engine here is really outside of the control of any individual purchaser. Using my experience with the Partnership to Fight Chronic Disease (PFCD) and work we've been doing at Emory, I can think of two major facts that are drawing the attention of policy makers.

Fact one. Thirty percent of the growth in spending in this country since 1985 went to the doubling of obesity. Until now, this not been part of the mainstream discussion about how to control healthcare spending. The real discussion has been more on demand side intervention, the structure of co-pays and deductibles. That is a fine discussion that needs to continue on, but the bottom line is we need to deal with healthcare costs and quality. It is much broader than what we have been discussing over the last 15 years. It really deals with a variety of interventions that transcend health benefits and delve into issues around population health, public health, schools communities, employer groups and so on.

Fact two. Three-quarters of all spending is linked to chronically ill patients; in Medicare that number jumps to 95 percent. Consider the fee-for-service Medicare metrics in terms of admission and readmission rates, clinic use and so on. They are off the charts in all the wrong direction. In one sense we should not be surprised. Why shouldn't it be? We do not spend a penny to do anything in terms of prevention and care coordination in the program. It is not set up to deal with these patients in terms of incentive payment structures and delivery system infrastructure. If we make even minor, modest investments to bring care coordination into that program and include dual eligibles, we can make an enormous difference in the health outcomes of Medicare patients and what we spend in this program.

Many of us have been working on this and are making some traction on saying what we can do in traditional fee-for-service Medicare to build prevention and care coordination into the program. As I hear more of the talk, I frankly have pilot and demo fatigue. We know the elements that work — that are important — from the data, the studies, the randomized trials that have already been conducted. I think if we study it and delay it even more, we are going to have more failure and *more* delay.

We have a real shot this year to build highly effective interventions into Medicare on two or three different fronts.

One is certainly to continue to expand the whole thrust of medical homes, which I think is a great idea. I have looked at this medical home issue for two or three years now. The policy challenge is: How do we build out the medical home engine yet, at the same time, recognize that 45 percent or so of primary care doctors work in groups of two, three, four and five. They will never be medical homes. We would never want them to be medical homes. They do not want to be medical homes. They don't have the capacity to do it.

Another is community health teams. I have been working on taking what we know works, building up these teams within smaller physician practices and incorporating all of the key elements that the successful models have in terms of transition care, integration and community-based resources. Then have them collaborate with doctors' offices to execute care plans, do transitional care and do the right thing in terms of executing a care plan that a physician's office puts together. We have great examples of this from Vermont, which does this for all patients. We have randomized trials showing how they work. I think that we are getting growing interest up on the Hill to do this because this is something that's scalable and replicable, very quickly. Going back to some of the tools that Dr. Williams has talked about, I think these will enhance the ability to do this effectively whether it's through remote technology or telemedicine or other types of technologies that will make the approach more effective.

In my opinion, our big challenge is ahead of us because there is always the resistance to spending a penny to save two. I think we know how to do it right and that means improve quality and save money, but it's going to require a small investment.

We are getting there. But people have to see a path about how to do it. We need to make the case that we have ideas, tools and approaches to do this; a modest investment will go a long way to producing tremendous results.

"We know the elements that work — that are important — from the data, the studies, the randomized trials that have already been conducted.

Better care coordination should be this simple.

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About Pharos

Founded in 1995, Pharos Innovations assists healthcare providers and payers in achieving next generation clinical and financial performance improvement. An innovative, device-free platform, Tel-Assurance, improves care coordination and drives dramatic clinical improvement and cost savings by remotely monitoring patients and averting unnecessary clinical events. Our enabling technologies proactively involve patients in their care and result in the early identification of clinical deterioration.

Tel-Assurance substantially expands the reach, efficiency and effectiveness of clients' current health management programs for complex chronic conditions. The Pharos Solution is strongly validated to show measured clinical improvement and financial impact, is the recipient of the prestigious American Heart Association National Outcomes award and was selected for the first-ever National Institutes of Health (NIH) sponsored evaluation of remote monitoring interventions.

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