The presentation will begin shortly.
Leveraging Technology to Drive Population Health
June 6, 2018

Speakers:
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• Emma Roberts, Director of Sales, NowPow
• Stephanie Fenniri, Senior Community Partnerships Manager, Parkland Center for Clinical Innovation
• Moderator: Julie Trocchio, Senior Director, Community Benefit and Continuing Care, Catholic Health Association of the United States
Leveraging Technology to Drive Population Health:
Implementing the CMS Accountable Health Communities Model at Allina Health

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Allina Health is a not-for-profit health system consisting of clinics, hospitals, and other health services, providing care throughout Minnesota and western Wisconsin.

- 12 Hospitals
- Over 90 clinics
- Received a CMS Accountable Health Communities Model Cooperative Agreement
What is the CMS Accountable Health Communities Model?

5-year cooperative agreement with CMS that tests whether systematically identifying and addressing the health-related social needs of community-dwelling Medicare and Medicaid beneficiaries impacts health care quality, utilization and costs.

– Allina Health received one of 32 awards nation-wide and the only site operating in Minnesota
– Full implementation June 2018- April 2022
Many drivers of health outcomes are beyond clinical care
- Health-related social needs, health behaviors and the physical environment significantly impact outcomes, utilization and costs

Emerging evidence shows that addressing health-related social needs through enhanced clinical-community linkages can improve health outcomes and impact costs

Supports attainment of Allina Health strategy to provide whole person care and perform on outcomes-based risk models
Must **screen** 75,000 and **navigate** 2,048 community dwelling Medicare, Medicaid and dual-eligible beneficiaries per year in geographic target area in following care-delivery settings:

**Outpatient**
- All Allina Primary Care Clinics and Urgent Care Clinics
- Behavioral Health Clinics
- OB/GYN Clinics

**Inpatient**
- Mercy (includes Unity), Cambridge & Regina Hospitals:
  - Emergency Department
  - Inpatient Mental Health
  - Mom/Baby
Required CMS Screening Tool

Questions address:
- Housing Instability
- Food insecurity
- Difficulty paying utility bills
- Interpersonal Violence
- Transportation

Accountable Health Communities (AHC) Health-Related Social Needs (HRSN) Screening Tool
What is an After Visit Community Referral Summary?

- Tailored list community resources automatically generated from NowPow based on screening results, patient address, age, and gender

- Curated resource list leverages existing community resource lists and customized to highlight preferred community partners and Allina-specific resources

- Community partners work with patients to address identified needs
The contents provided are solely the responsibility of the authors and do not necessarily represent the official views of HHS or any of its agencies. The project described was supported by Funding Opportunity Number CMS – 1P1-17-001 from the U.S. Department of Health & Human Services, Center for Medicare & Medicaid Services.
We are a women-owned and led technology business

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We combine medicine, health care, business, data analytics, and community expertise to revolutionize self care
NowPow reduces barriers to accessing self care resources

The Care Information Gap

Referral Senders
- Health care providers
- Health care payers
- Public housing providers
- Corrections re-entry

Referral Receivers
- Community Based Organizations

Care coordinators
- Case managers
- Probation officers
- Social workers
- Community health workers

Patients, Clients, Residents

Smoking cessation class
- Fitness class
- Food pantry
- Supportive housing
Dr. Lindau pioneered the idea of e-prescribing "community," with the CMMI CommunityRx award.

- **$5.8M CMMI Innovation Award to University of Chicago from 2012-2015**
- Demonstrated in **33 clinical sites** on Chicago's South Side
- Connected with EHRs: Epic, GE Centricity, and NextGen
- Generated **350,000 HealtheRxs**
- Medicare beneficiaries had **significantly fewer** inpatient stays and unplanned readmissions *
- Medicaid beneficiaries had **significantly fewer** ED visits *

* Source: Third Annual Report, RTI, CMMI Third Party Evaluator, March 2017
We seamlessly connect health care to self care creating strong community networks to help people get the self care they need.

- 600,000 resources shared in 2017
- 7,000 care professionals on the platform
- Completed Epic, Athena, GE Centricity & Allscripts integrations
- Launching Long Island and Mississippi in Q2
Our multi-sided platform is configured to fit tightly into workflows, capture insights and assess impact all along the process.

1. Identify
   - Identify needs using screenings, risk factors and/or condition codes

2. Match
   - Leverage algorithms and filters to find highly matched services for people

3. Share
   - Generate a personalized list or single referrals and share via and text, email, or print

4. Track
   - For higher risk patients, make tracked referrals with CBOs to close the loop on care

5. Engage
   - Support people in the process using bi-directional communication and reminders

6. Analyze
NowPow resource information is a **true collaboration**

We partner with local directory initiatives and incorporate users' internal lists and "black books".

We take geographical nuances into account and gather feedback from users regularly.

**Twin Cities Resource Directory Snapshot**
- 14 counties in greater metro area
- 2,900 organizations
- 9,360 programs and services
- 775 care professional users
Health Related Social Needs (HRSN) Screening in NowPow

AHC HRSN Screening Tool

Information

These questions ask about needs that affect health. By answering them, we may be able to provide you with information about resources in the community that may help you. You may choose not to answer any or all of the questions. Please check the option that most closely describes your situation.

Complete the following statement. I am answering this survey about... *
- Myself
- My child
- Another adult for whom I provide care
- Other

For the rest of the questions, please think about the person you have chosen above when answering the following and select the option that best describes them.

How many times have you received care in an emergency room or urgent care visits? *
- 0 times
- 1 time
- 2 or more times

Do you live in any of the following locations? *

Patient-facing screening

Take a screening in NowPow

NowPow connects people to high quality community resources

Screening Code for Noah Arnold:

103967

This code is valid for 15 minutes. Enter code into app.nowpow.com/screen to access the patient-facing screening.
Key Challenges and Learnings

- Building the case internally to integrate new technology into existing electronic medical records systems
- Addressing concerns related to privacy and information sharing (e.g. texting patients and sending referrals to community organizations)
- Configuring the service returns on the Community Referral Summary and finding solutions to challenges such as domestic violence needs
- Honing the resource directory by taking geographical nuances into account (e.g. county-limited services, focus on free and sliding fee services, focus on rural areas)
Thank you!

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Leveraging Technology to Drive Population Health: Connected Communities of Care

Stephanie Fenniri, MPA

June 6, 2018
CREATING A WORLD OF CONNECTED COMMUNITIES WHERE EVERY HEALTH OUTCOME IS POSITIVE

MISSION: Reimagine and expand the knowledge base of healthcare through prescriptive analytics and artificial intelligence to deliver precision medicine.

Leading clinical expertise applying practical insights across the continuum of care

Prescriptive analytics and artificial intelligence driving personalized and precision medicine

Clinical Insights

Data Science Expertise

Innovation Framework

Innovation process and discipline, building breakthroughs and leading change
PCCI’s VALUES

PROGRESS
We value progress over perfection. Our work is both innovative and practical.

COLLABORATION
We collaborate with our team, our partners and the community enabling us to go further, faster. There is power in diversity and numbers.

CARING
We have a servant approach and mindframe. Caring about each other, our partners and those we serve in the community is what motivates us every single day.

INITIATIVE
We go beyond what is asked of us. Expectations are starting points.

SCIENCE
We balance Innovation with science. Our work is grounded in scientific principles and rigor.

VISION
"We can do it if..." vs "We can't do it because...". We see healthcare, not as it is, but as it can become.
PCCI ECOSYSTEM

Non-profit, Innovation, Early Stage Advanced Analytics R&D Organization

One of the largest and most technologically advanced public health systems in the world serving a very diverse and vulnerable population.

For-profit, Technology and Advanced Analytics Company
OUR TEAM

CLINICAL EXPERTISE
11 MDs/PhDs/MBA/MS
Epidemiology, oncology, primary care, health economics, informatics, public health, chronic care delivery design and evaluation, pediatrics, and health services research.

DATA SCIENCE
9 PhDs/MD/MS
50+ years experience
Advanced Analytics, NLP, predictive modeling, AI, ML, NoSQL, R, Python

AGILE • DESIGN THINKING • INNOVATION • COLLABORATION

ADVANCED DATA ARCHITECTURE & PLATFORM
OUR JOURNEY

2010
INCUBATED AT PARKLAND HEALTH & HOSPITAL SYSTEM
$50M+ GRANTS AND 29 PEER-REVIEWED PUBLICATIONS

2018
R&D AND INNOVATIONS IN PROGRESS
DCCC, Opioids, oncology, palliative care, medication management,
mental/behavioral health, post-acute, pediatric asthma, pre-term births,
wearables and digital technology
STRAategic AREAS OF FOCUS

Connected Communities of Care

Personal Engagement

Hospitals Reimagined

Innovation Portal
HISTORY OF THE DALLAS IEP

2006-2008
Research at PHHS discovers the link between social factors and readmissions

2008-2010
Information Exchange Portal Conceptualized, through community and stakeholder engagement, town halls, research and early intelligent technology innovations

2010-2012
CFT funds IEP Needs Assessment & Design Blueprint Completed

2012-2014
“Six Track” program structure designed; community engaged

2015-2019
CFT Grant award to build, implement & sustain the Dallas IEP
PCCI\textit{Connect} is a portfolio of proprietary information exchange products, including PCCI’s Connected Communities of Care, that focus on addressing the health and social needs of a community. The program connects healthcare providers and CBOs to coordinate the communication and care for individuals.

- Cutting edge cloud-based technology that enables bi-directional communication, referrals, and service tracking
- Comprehensive Playbook covering:
  - Legal, policy, and governance documents
  - Clinical and community workflows
- Continually updated inventory of clinicians and community service providers
- Innovation network for learning, research, co-creation, and rapid knowledge dissemination
1. Identify target clinical conditions
2. Identify social needs that impact clinical conditions
3. Describe population to be served by the Dallas information exchange platform
4. Describe the organizations and users of the Dallas information exchange platform
5. Develop use cases for the Dallas information exchange platform
• Comprehensive referral directory (integrated with 2-1-1 systems)
• Configurable intake forms
• Cloud-based: accessible anywhere you get the internet
• HIPAA compliant
• 2-factor security
• 24/7 customer support
• Multiple user roles keeps sensitive information in the right hands
• Standard and custom reporting
Pieces Iris:
- Queries for client in group networks
- Shares documents
- Makes Referrals
- Community Resource Directory
- Tracks goals / KPIs
- Reporting

Iris at the Hospital:
- CBO encounters visible
- Incoming and outgoing referrals
- Track and assess community health programs

Iris at a Food Pantry:
- Case managers see encounters and referrals
- Food distribution tracking and KPIs
- Improves adherence to client specific nutritional recommendations
COMMUNITY ADOPTION

- Over 100 organizations in DFW
- Includes two major umbrella organizations with national accolades:
  - North Texas Food Bank
  - Metro Dallas Homeless Alliance
- Mental Health
- Criminal Justice Reintegration Services
- Prevent Blindness Texas
- VNA

1 million services documented; 215K+ unique patients impacted
Build clinical workflows and utilize predictive analytics and AI to prevent readmissions, save lives and reduce healthcare costs.

**TECHNOLOGY**

Pieces Iris™ technology to create bi-directional exchange of information, smart referrals and individual tracking.

**CLINICAL**

Develop CBO workflows and understand SDoH’s impact on quality of life and how connected communities build a support system for a path to self sufficiency.

**SUSTAINABILITY**

ROI and SROI to support ecosystem to provide better healthcare to the individuals in their communities. Strive to improve healthcare trends across the national continuum.
ACCOUNTABLE HEALTH COMMUNITIES

Model Demonstration: Standard social screens at point of health care. High needs & high ER utilizers navigated for six months through community services.

Goal: Decrease utilization, improved outcomes

Process: Community Accountability
IMPACT TO DATE

- PHHS and ~100 CBOs engaged
- 215,000 unique patients have been impacted and enrolled into various programs and services focused on a variety of social services, i.e. addressing food insecurity, housing assistance, and increasing access to health care.
- 1 million services have been documented across a variety of social service domains
- Feasibility of cross-sector coordination and alignment was completed for a pilot cohort of Parkland patients with the highly prevalent conditions of hypertension/diabetes and food insecurities
EMERGING REQUIREMENTS IN THE CCC JOURNEY

Supporting and Expanding CBO Networks
Community Wide Smart Data
Individual Empowerment through Pieces Iris App

National Connected Communities of Care via PCCI Innovation Portal
Please click the link below to take our webinar evaluation. The evaluation will open in a new tab in your default browser.

https://www.surveymonkey.com/r/aha_webinar_06-06-18
Q & A
Continue to celebrate CHI Week with ACHI

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