Fall September 19, 2016

RWJF Systems for Action Program to Build a National Culture of Health: Overview

Cezar Brian C Mamaril
RWJF Systems for Action Program to build a national Culture of Health

http://www.systemsforaction.org/

OVERVIEW

2nd Annual Interdisciplinary Population Health Conference: Persistent and Emerging Issues in Population Health Science
Pennsylvania State University
September 19, 2016

Presented by CB Mamaril for S4A
S4A Leadership Team

Robert Wood Johnson Foundation

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Data Analyst/Statistician

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Mission: Widen the lens beyond health care and public health systems

Rigorous research to identify novel mechanisms for aligning delivery & financing systems in medical care, public health, & social & community services in ways that improve health & wellbeing, achieve efficiencies in resource use, & reduce inequities.

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Wide lens: implicated sectors

- Public health
- Medical care: ACOs, PCMCs, AHCs
- Income support
- Nutrition & food security
- Education & workforce development
- Housing
- Transportation
- Criminal justice
- Child & family services
- Community development & finance
Study novel mechanisms for aligning systems & services across sectors

- Innovative alliances & partnerships
- Inter-governmental & public-private ventures
- New financing & payment arrangements
- Incentives for individuals, organizations & communities
- Governance & decision-making structures
- Information exchange & decision support
- New technology: m-health, tele-health
- Community engagement, public values & preferences
- Innovative workforce & staffing models
- Cross-sector planning & priority-setting
Collaborating Research Centers

- **Arizona State University**: Analysis of medical, mental health, & criminal justice system interactions for persons with behavioral health disorders

- **IUPUI**: Evaluating integration & decision support strategies for a community-based safety net health care & public health system

- **University of Chicago**: Randomized trial of a Comprehensive Care, Community & Culture program

- **University of Kentucky**: Measuring multi-sector contributions to public health services & population health outcomes.
Individual Research Projects

- **Los Angeles Department of Health:** Evaluation of Housing for Health initiative, which provides permanent housing & supportive services for vulnerable populations

- **Drexel University:** Evaluation of Building Wealth & Health Network within anti-poverty programming

- **Michigan State University:** Randomized trial of Community Complex Care Response Team

- **University of Delaware:** Randomized trial to test the efficacy of using the team approach to leverage different financing systems & services
For More Information

Systems for Action
National Coordinating Center
Systems and Services Research to Build a Culture of Health

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National Longitudinal Survey of Public Health Systems

- Cohort of 360 communities with at least 100,000 residents
- Local public health officials report:
  - **Scope**: availability of 20 recommended population health activities
  - **Network**: organizations contributing to each activity
  - **Centrality of effort**: contributed by governmental public health agency
  - **Quality**: perceived effectiveness of each activity

** Expanded sample of 500 communities<100,000 added in 2014 wave
Mapping who contributes to population health

Node size = degree centrality
Line size = % activities jointly contributed (tie strength)

Classifying multi-sector delivery systems for population health 1998-2014

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**Scope**

- High
- Mod
- Low

**Centrality**

- High
- Mod
- Low

**Density**

- High
- Mod
- Low

**Types**

- **Comprehensive** (High System Capital)
- **Conventional**
- **Limited**
Comprehensive Public Health Systems
One of RWJF’s Culture of Health National Metrics

- **Broad scope** of population health activities
- **Dense network** of multi-sector relationships
- **Central actors** to coordinate actions

**Access to public health**

Overall, 47.2 percent of the population is covered by a comprehensive public health system. Individuals are more likely to have access if they are non-White (51.5 percent vs. 45.5 percent White) or live in a metropolitan area (48.7 percent vs. 34.1 percent in nonmetropolitan areas).

47.2% of population served by a comprehensive public health system

NLSPHS Data linkages expand analytic possibilities

**Area Health Resource File:** health resources, demographics, socioeconomic status, insurance coverage

**NACCHO Profile data:** public health agency institutional and financial characteristics

**CMS Impact File & Cost Report:** hospital ownership, market share, uncompensated care

**Dartmouth Atlas:** Area-level medical spending (Medicare)

**CDC Compressed Mortality File:** Cause-specific death rates by county

**Equality of Opportunity Project (Chetty):** local estimates of life expectancy by income

**National Health Interview Survey:** individual-level health

**HCUP:** area-level hospital and ED use, readmissions
Thank You
Supplementary Slides
ASU School for the Science of Health Care Delivery & School of Criminology & Criminal Justice will integrate data from AZ medical, mental health, & criminal justice systems to explore opportunities for better coordinating services for persons with mental illness & substance abuse disorders.

Use interactive system dynamics modeling & network analysis methods to identify how people & dollars move between & within AZ’s medical, mental health, & criminal justice systems.

Interactive simulation models informed by stakeholder input will explore how changes to funding streams & service delivery models can produce improved health & social outcomes.
S4A CRC: Improving Population & Clinical Health with Integrated Services & Decision Support

- Retrospective studies & prospective RCT to test effectiveness of strategies to integrate delivery of medical, public health, & social services for low-income populations receiving care through Indianapolis’ network of FQHCs. Provide insights into value of these integrated approaches.

- Strategies include use of population health nurses who conduct home & community visits, interdisciplinary case conferences of medical & public health professionals, novel electronic decision support tool that combines clinical, social, & public health data to better characterize social & physical environments where patients live.
S4A CRC: The Comprehensive Care, Community, & Culture Program

- RCT to test feasibility & effectiveness of a comprehensive community care model for low-income, urban-dwelling seniors at high risk of hospital admission, & examine individual & combined effects of these strategies on important health & economic outcomes for vulnerable seniors.

- Model combines (1) “comprehensivist” physicians who provide both inpatient & outpatient care for their patients, (2) community health workers who connect seniors to needed social & community services such as transportation & food assistance; & (3) a community arts & culture program designed to strengthen social support & community engagement.
S4A IRP: Housing for Health: Assessing the Cross-Sector Impacts of Providing Permanent Supportive Housing to Homeless High Utilizers of Health Care Services

- Evaluate Housing for Health initiative that aims to reduce homelessness & the unnecessary use of health care resources, & improve outcomes for vulnerable populations by providing permanent housing & supportive services.

- Propensity score-matched difference-in-difference research design with longitudinally-linked medical & social service record data to assess housing initiative’s cross-sector impacts & organizational & financing issues.
S4A IRP: The Impact of Integrating Behavioral Health with Temporary Assistance for Needy Families to Build a Culture of Health across Two-Generations

- Evaluate Building Wealth & Health Network that aligns Medicaid coverage for behavioral services & TANF in PA to reduce children's developmental risks & improve future income & employment, while reducing number of returning TANF beneficiaries.

- Use a propensity score-matched difference-in-difference research design with longitudinally-linked service records and client-reported survey data to assess network’s impacts & identify ways to improve support systems to promote a Culture of Health within anti-poverty programming.
S4A IRP: Testing of a Community Complex Care Response Team to Improve Geriatric Public Health Outcomes

- Evaluates MI’s Community Complex Care Response Team, a collaboration of 3 community agencies that provides medical care, public health, social & community services to decrease potential vulnerabilities & promote health, wellness, & independence in older adults.

- Pragmatic RCT to examine impact of coordinated service delivery on emergency department utilization; explore which institutions are best positioned to perform integrator roles to connect vulnerable older adults to needed services & supports; & identify data sharing & storage challenges across health & human service sectors.
S4A IRP: Implementing a Culture of Health among Delaware's Probation Population

- Investigates process & impact of implementing a multi-agency “Culture of Health” team in the DE Department of Probation to address health, substance abuse, mental illness, education, transportation, employment, & housing issues faced by individuals under probationary supervision.

- Pragmatic RCT to test efficacy of using team approach to leverage different financing systems & service coordination by providing education, screening, testing & referral with follow-up services.