Public Health and Primary Care Integration through Enhanced Public Health Information Technology (PHIT) Maturity
A Case for Behavioral Health

UNIVERSITY OF MARYLAND

primary care coalition of Montgomery County, Maryland

MONTGOMERY COUNTY MARYLAND

Partnership and Collaborations

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Montgomery County Department of Health and Human Services (DHHS): Uma S. Ahluwalia, MSW, MHA, Stuart Venzke, COO, Yang Yu, MS, MA, Colleen Ryan-Smith, MPH

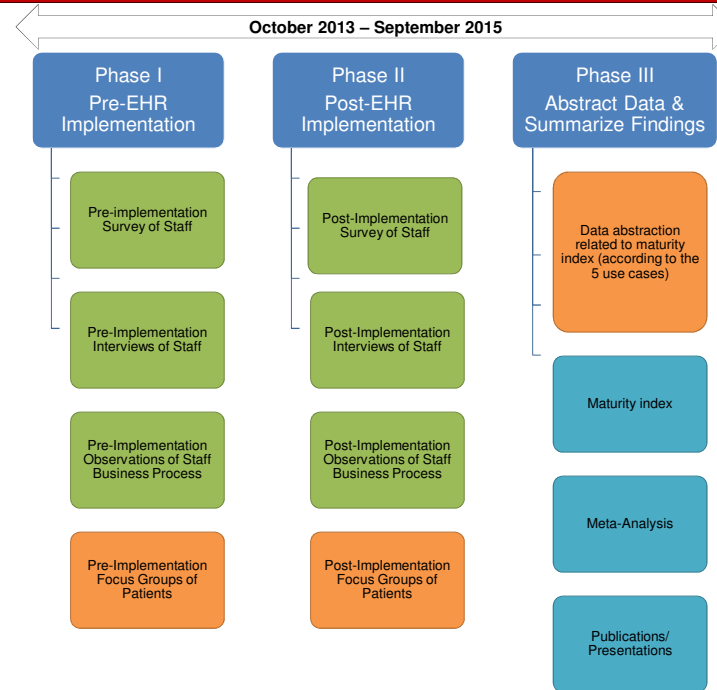**Primary Care Coalition of Montgomery County (PCC):** Thomas L. Lewis, MD, Steven M. Galen, MS

Background

- Limited understanding and evidence exists for the role and potential of health information technology (HIT) at the intersection of primary care and public health.

- There is significant national attention on the potential of electronic health records (EHRs) to improve patient health and healthcare and reduce costs at the provider and population level.

- The promise of these technologies to inform and catalyze fundamental changes and improvements in the public health system is significant.

- EHRs and complementary information technology (health information exchange, data warehouses, epidemiological and surveillance systems, etc.) may be viewed as transformational tools that can address multiple systemic deficiencies in healthcare delivery in the public health-primary care space.
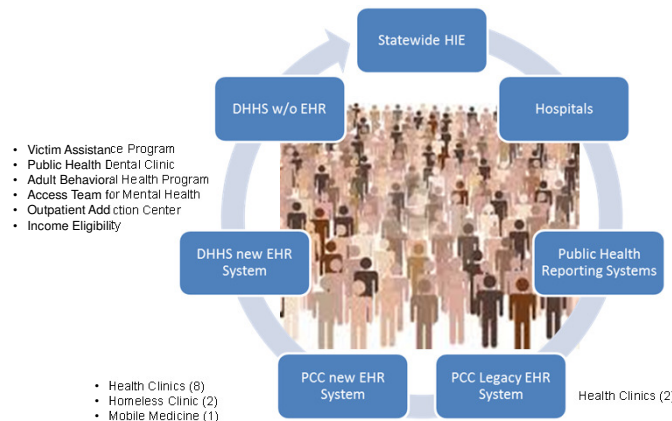
Research Objectives

- Aim 1: Assess the implementation of an EHR designed to integrate the public health delivery system and primary care in creating effective and efficient public health information technology systems.

- Aim 2: Measure and document the effects of an EHR for public health and primary care integration on improved behavioral health management at individual and population levels.

- Aim 3: Develop a Public Health Information Technology Maturity Index (PHIT MI), that captures the capacity of diverse HIT systems to inform health care improvement and integration.

Timeline

October 2013 – September 2015

Phase I Pre-EHR Implementation
- Pre-implementation Survey of Staff
- Pre-Implementation Interviews of Staff
- Pre-Implementation Observations of Staff Business Process
- Pre-Implementation Focus Groups of Patients

Phase II Post-EHR Implementation
- Post-Implementation Survey of Staff
- Post-Implementation Interviews of Staff
- Post-Implementation Observations of Staff Business Process
- Post-Implementation Focus Groups of Patients

Phase III Abstract Data & Summarize Findings
- Data abstraction related to maturity index (according to the 5 use cases)
- Maturity index
- Meta-Analysis
- Publications/ Presentations

Systems in Scope

- Victim Assistance Program
- Public Health Dental Clinic
- Adult Behavioral Health Program
- Access Team for Mental Health
- Outpatient Addiction Center
- Income Eligibility

Statewide HIE
DHHS w/o EHR
Hospitals
DHHS new EHR System
Public Health Reporting Systems
PCC new EHR System
PCC Legacy EHR System

- Health Clinics (8)
- Homeless Clinic (2)
- Mobile Medicine (1)

Health Clinics (2)

Research Design

- The study setting is 12 primary care clinics and 7 health and human services sites that provide a variety of behavioral health and social services.

- The overall research strategy for addressing the 3 study aims draws upon the principles of a mixed-methods approach. The project entails primary and secondary data collection, quantitative and qualitative data analysis, and case studies.

- For Aim 1, we will conduct an intensive analysis using both qualitative and quantitative techniques of the implementation of the EHR within PCC and DHHS facilities, using interviews, observations, and surveys of users and stakeholders.

- For Aim 2, we will conduct quantitative comparisons of multiple outcomes related to the prevention, communication, delivery and effects of behavioral health services across four groups of facilities: those in and out of behavioral health integration program, and those not adopting the common EHR (control group) and those adopting the EHR (treatment group).

- Finally, the approach for Aim 3 synthesizes and consolidates the data collected in Aims 1 and 2 to extract constructs and items that are relevant for the construction of a public health information technology maturity index.

For more information

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Follow the project blog at: http://blogs.rhsmith.umd.edu/phit

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Acknowledgements