



**POPULATION HEALTH SERIES:**  
*Introduction to Population Health*



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**CE STATEMENT**



The **Georgia Board of Nursing** deems **Southwest Georgia Area Health Education Center (SOWEGA-AHEC)** as an approved provider for nursing continuing education (CE). This activity is approved for **1.0** contact hour towards the continuing education competency requirement for Georgia nursing licensure renewal. No partial credit offered. Activity #2020-02a.

**Note:** Submission of registration information, attendance and completed evaluation/successful post-test required for Nursing continuing education certificates.

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**DISCLOSURES & COMMERCIAL SUPPORT**

Planners & presenter disclosed no potential conflicts of interest at this time.

No commercial support provided for this educational activity.

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**LEARNING OUTCOMES**

- Describe drivers within the US health care delivery system toward value-based models of care
- Define the term "population health"
- Identify sources of data to define population health needs

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**HEALTHCARE QUALITY & SAFETY**

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**NATIONAL QUALITY STRATEGY**

**Better Care:** *Improve the overall quality of care by making healthcare more patient-centered, reliable, accessible, and safe.*

**Healthy People, Healthy Communities:** *Improve the health of the U.S. population by supporting proven interventions to address behavioral, social, and environmental determinants of health in addition to delivering higher-quality care.*

**Affordable Care:** *Reduce the cost of quality healthcare for individuals, families, employers, and government.*

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The mission of the U.S. Department of Health and Human Services (HHS) is to enhance and protect the health and well-being of all Americans by providing for effective health and human services and by fostering sound, sustained advances in the sciences underlying medicine, public health, and social services.

### DEPARTMENT OF HEALTH & HUMAN SERVICES

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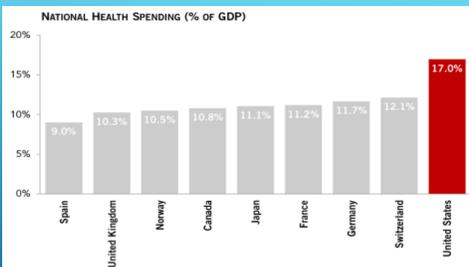
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HEALTH CARE SPENDING AS A PERCENTAGE OF GROSS DOMESTIC PRODUCT

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- ▶ **Health** – A state of complete physical, mental, and social well-being and not merely the absence of disease or infirmity. Some people have adapted this definition to also include spiritual well-being. World Health Organization
- ▶ **Outcomes** – The effect the process has had on the people targeted by it. These might include, for example, changes in their self-perceived health status or changes in the distribution of health determinants, or factors which are known to affect their health, well-being, and quality of life.

Pathways to Population Health | [www.jhi.org/p2ph](http://www.jhi.org/p2ph)

### DEFINITIONS FOR KEY POPULATION HEALTH TERMINOLOGY

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▶ **Defined population** – A group of people with something in common. They can be self-defined or defined by someone working with that population.

▶ **Place-based population** – A group of people who live in a geographically defined area (e.g., a neighborhood, city, county). All are impacted by policies, structures, and systems that are particular to the place they live

Pathways to Population Health | www.jhi.org/p2ph

**DEFINITIONS FOR KEY POPULATION HEALTH TERMINOLOGY**

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▶ **Population health** – The health outcomes of a group of individuals, including the distribution of such outcomes within the group.

▶ **Population management** – The delivery of health care services toward the achievement of specific health care-related metrics and outcomes for a defined population.

▶ **Population health improvement** – Efforts to improve health, wellbeing, and equity for defined or place-based populations.

Pathways to Population Health | www.jhi.org/p2ph

**DEFINITIONS FOR KEY POPULATION HEALTH TERMINOLOGY**

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▶ **Equity** – Everyone has a fair and just opportunity to be healthier. This requires removing obstacles to health such as poverty, discrimination, and their consequences, including powerlessness and the lack of access to good jobs with fair pay, quality education and housing, safe environments, and health care.

▶ **Health inequity** – Differences in health outcomes between groups within a population that are systematic, avoidable, and unjust.

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**DEFINITIONS FOR KEY POPULATION HEALTH TERMINOLOGY**

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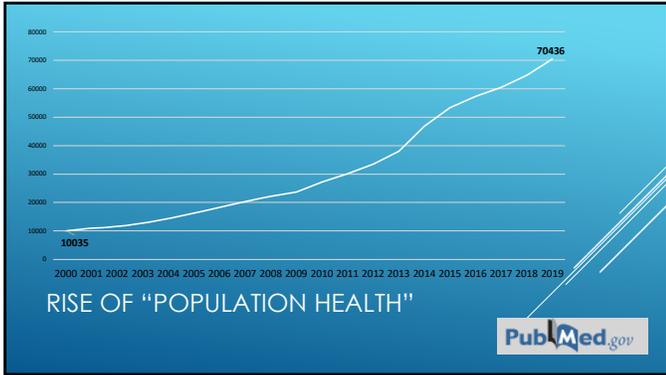
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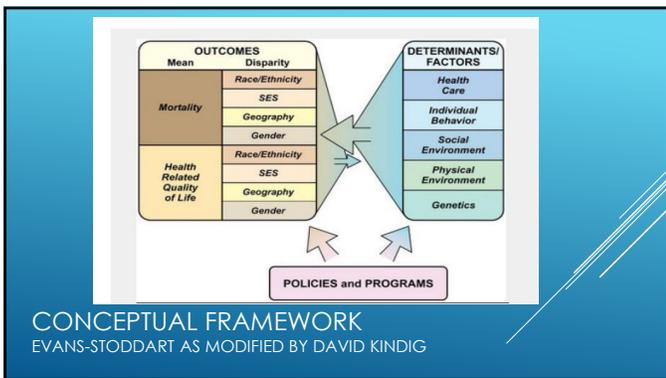
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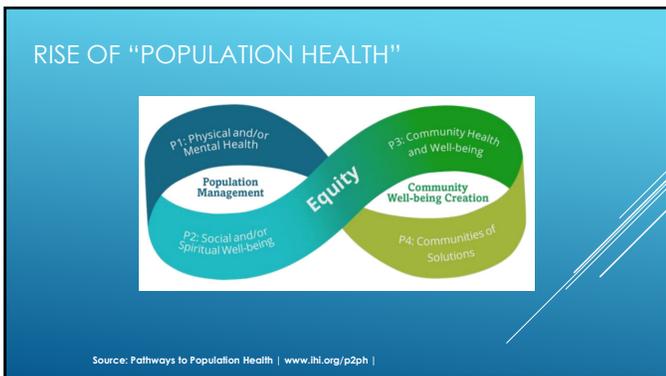
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**Effective Healthcare:**

- ▶ Right Patient Need(s) Identified
- ▶ Right Treatment(s) Provided
- ▶ By the Right Professional(s)
- ▶ At the Right Time(s)
- ▶ Producing the Right Health and Satisfaction Outcome(s)

**Efficient Healthcare:**

- ▶ Clinical and administrative work flow processes that operate within optimal time and cost specifications

**EFFECTIVE & EFFICIENT HEALTHCARE**

Source: Care Transitions Network

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**1**  
Population-Based Care: Focus on caring for the whole population you are serving, not just the individuals actively seeking care.

**2**  
Data-Driven Care: Utilize data and analytics in order to make informed decisions to serve those in your population who most need care.

**3**  
Evidence-Based Care: Make use of the best available evidence to guide treatment decisions and delivery of care.

**4**  
Care Management: Engage in actionable care management for the population you serve.

**PRINCIPLES OF POPULATION HEALTH**

Source: Care Transitions Network

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**1 DEFINE** Population Identification

**2 ASSESS** Health Assessment

**3 STRATIFY** Risk Stratification

**4 ENGAGE** Enrollment / Engagement Strategies

**5 MANAGE** Management / Interventions

Tailored Interventions  
Care Coordination  
Disease / Case Management  
Health Risk Management  
Health Promotion / Wellness

Meeting patients where they are

...physically  
home | school | work | shopping | in the clinic

...in the way that works best for them  
email | text | internet | phone | video | face-to-face

**FRAMEWORK**

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**Air Traffic Controllers**



**Care Traffic Controllers**



Source: Care Traffic Controllers - John Halemski, MD - Professor of Medicine at Harvard Medical School and the CIO of Beth Israel Deaconess Medical Center (BIDMC) in Boston

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UNDERSTANDING YOUR POPULATION

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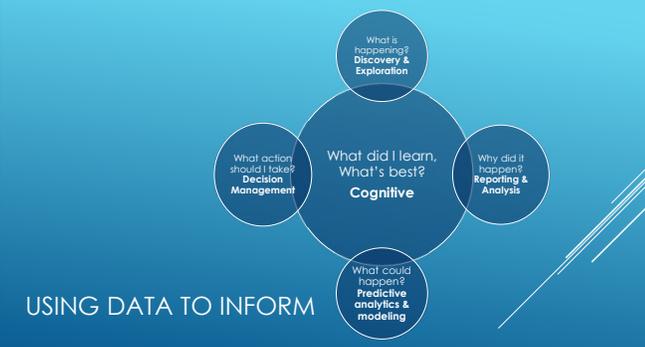
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USING DATA TO INFORM

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The healthcare transformation is driving healthcare organizations to be able to manage patient populations to improve health, improve outcomes and reduce costs. They must gain deeper insight into population chronic disease cohorts to enable proactive interventions.

This insight requires the capture and centralization of disparate **data** sources to enable enterprise wide reporting.

The movement to value based care requires population insights to get the **right data to the right place at the right time** in order to truly impact patient care.

DATA DRIVEN SOLUTIONS

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- ▶ Claims Data
- ▶ Electronic Health Record Data
- ▶ Social and Community Determinants of Health
- ▶ Patient Generated Data
- ▶ Prescription and Medication Adherence Data

WHICH HEALTHCARE DATA IS IMPORTANT FOR POPULATION HEALTH MANAGEMENT?

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- ▶ Web and social media data: Clickstream and interaction data from social media such as Facebook, Twitter, LinkedIn, and blogs. It can also include health plan websites, smartphone apps, etc.
- ▶ Machine-to-machine data: Readings from sensors, meters, and other devices.
- ▶ Big transaction data: Health care claims and other billing records increasingly available in semi-structured and unstructured formats.
- ▶ Biometric data: Fingerprints, genetics, handwriting, retinal scans, and similar types of data. This would also include X-rays and other medical images, blood pressure, pulse and pulse-oximetry readings, and other similar types of data.
- ▶ Human-generated data: Unstructured and semi-structured data such as electronic medical records (EMRs), physicians' notes, email, and paper documents.

WHAT EXACTLY IS BIG DATA?

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- Personal health history for key chronic conditions, such as cancer or heart disease
- Lifestyle behaviors that contribute to chronic conditions,
- Biometrics
- Applicable preventive services
- Substance use or abuse
- Symptoms of depression risk
- Readiness to change

Questions for Medicare and Medicaid populations might include questions on Activities of Daily Living (ADLs) and Instrumental Activities of Daily Living (IADLs), or whether an individual has transportation issues.

## DATA DRIVEN SOLUTIONS – HEALTH RISK ASSESSMENT

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A data driven process for the timely identification of extreme patterns in a defined region of the healthcare system  
Used to guide targeted intervention and follow up to better address patient needs, reshape ineffective utilization, and reduce costs



## HOT SPOTTING

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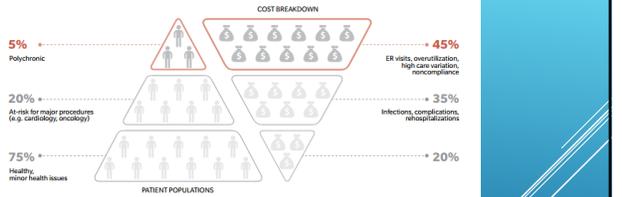
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The upside-down pyramid (Today): Cost by clinical segment



## STRATIFICATION

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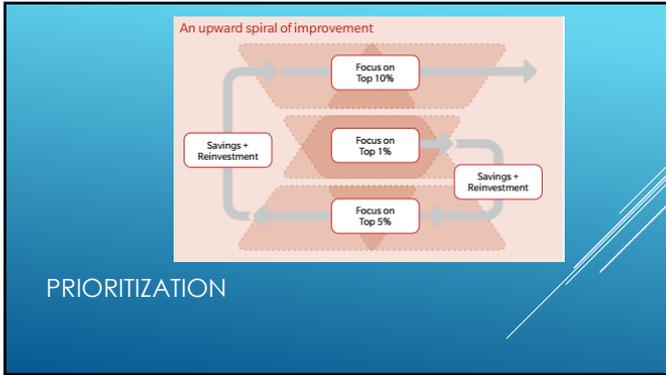
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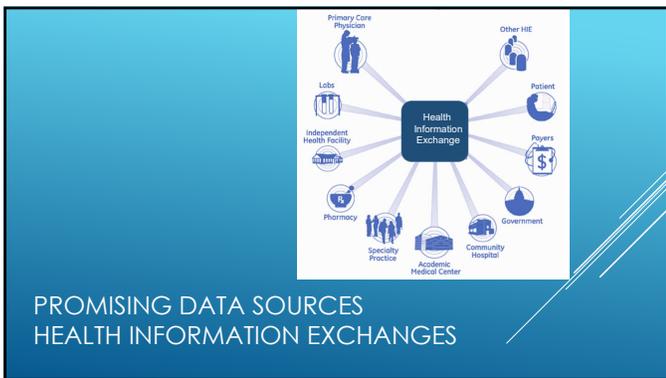
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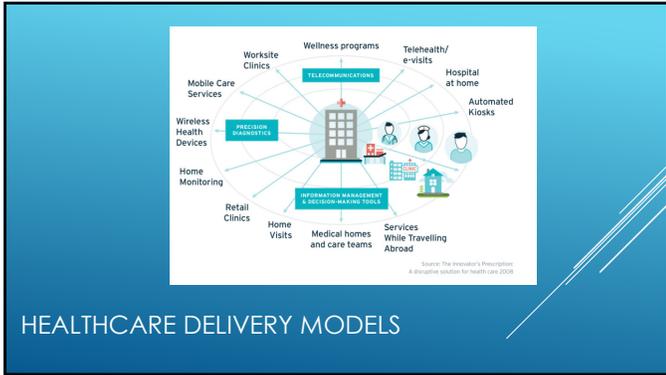
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Identify opportunities to impact health earlier and act on those opportunities

ANALYTICS	PREVENTION	DISEASE MGMT	CARE MGMT SYSTEM
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We need to think differently about how to activate our patients and communities

PATIENT ENGAGEMENT	COMMUNITY ENGAGEMENT	WELLNESS
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And how we interact with them

ACCESS	CARE COORDINATION	PALLIATIVE CARE	CARE TRANSITIONS
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*"If I had nine hours to cut down a tree, I would spend six hours sharpening my axe."*

-- Abraham Lincoln

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LEARNING OUTCOMES

- Describe drivers within the US health care delivery system toward value-based models of care
- Define the term "population health"
- Identify sources of data to define population health needs

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EVALUATION

Submission of registration information, attendance and completed evaluation/successful post-test required for CE certificates.

<https://www.surveymonkey.com/r/pophealthdemand6>

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