The Future of Health Information Management

Challenges & Opportunities

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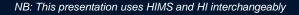
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"The future belongs to those who believe in the beauty of their dreams."

CONTENTS:

The following will be covered in this presentation

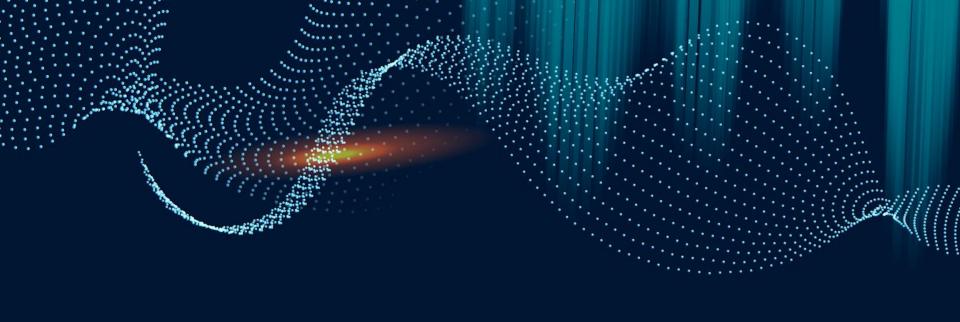
- 1. A Historical look at how we got here.
- 2. What do we mean when we talk about the future.
- 3. Literature Review.
 - Academia
 - Careers
 - Technology
- 4. Challenges
- 5. Opportunities
- 6. Discussion
- 7. Conclusion
- 8. Q&A



My Background

- Disclaimer: I am not an RHIT or RHIA I am only providing information
- Bcom (General Business), Mcom (Business Administration), DM (Management and Organizational Leadership)
- Certified Professional in Health Information Management Systems (CPHIMS)
- Certified Diversity Professional (CDP)
- Academia (Faculty Strategic Management and Organizational Behavior)
- Banking (Credit Manager Data and Compliance)
- Healthcare Quality Management (CMS, TJC, Compliance)
- Health Information Management
- Privacy Officer





O1 The Past
A brief history of HIMS

Health Information Management

AHIMA defines HIM as

"... the body of knowledge and practice that ensures the availability of health information to facilitate real-time healthcare delivery and critical decision making for multiple purposes across diverse organizations, settings, and disciplines."

CHIMA Defines HIM as

"... the discipline that focuses on healthcare data and the management of healthcare information, regardless of the medium or format"

A Review of the Past!

1. Early-Stage (upto 1975)

- Pioneering work on decision support
- Modelling and Simulation of processes
- Biostatistics need for standardization
- Formation of American Association of Record Librarians (AHIMA)
- Medicare and Medicaid documented care for reimbursement



2. Childhood (1975 – 1990)

Popularity of personal computers
Health-related software applications
Hospital IT – connection of financial and clinical systems
Formation of National and International Organizations
Specialized Schools – Development of Methodologies
Health Information Systems

3. Consolidation (1990 – 2000)

Health Information Exchange (12M patients, 20k providers, 12k practices, VA administrations)
Medical Informatic emerges as a discipline
Growing need for EHR
Confidentiality / Data Protection / Standards

4. Maturity (2000 - 2010)

Potential for e-Health
Emergence of sub-disciplines (bioinformatics,
neuroinformatic etc.,)
Potential of e-Health business
Government involvement (President G. Bush –
computerized health records – triggering EHR revolution)
ARRA – HITECH
Cloud Computing

5. Full Integration (2010 – 2020)

Horizontal Integration (Primary care, specialized ambulatory and hospital data)
Full Interoperability
Patient empowerment
Increased focus on patient safety
Telehealth and Tele-assistance
Steps toward "personalized medicine"

When is the Future... Really

Beyond 2030?

Are we doing everything we can to prepare for the future

Is the Future Further out – 2050 maybe?

Is it too early to predict what HIMS will look like in 2050

Who Determines when the Future is?



What Does the Future look for HIMS?



Intergration of Sytems

Data sharing and Interoperability
Advanced Information
Exchange



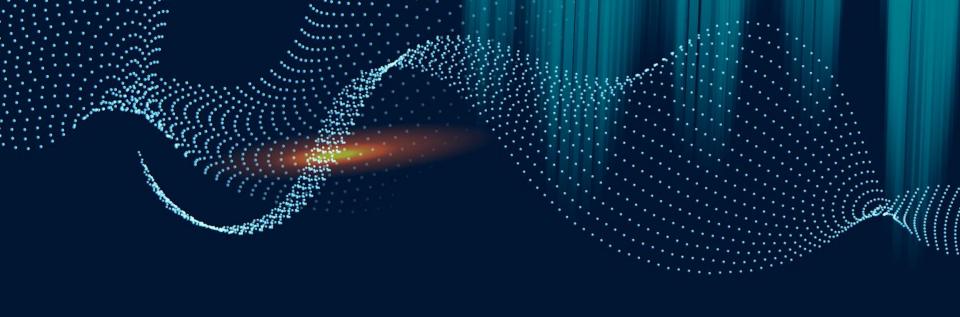
Personalized Medicine

Development of population and person-specific care (HIM360?)



Merging of Disciplines

Will HIMS and IT Merge or will there emerge new disciplines (AI?)



The Present
Where are we now

Literature Review

Search Criteria:

"Future of HIMS"

"Future of Health Information"

"Health Information Management"

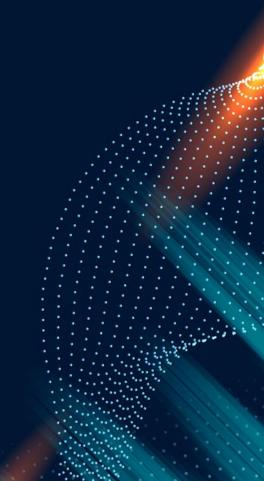
Period: 2019 - 2023

Database: EBSCO Host

Return: 2,690

Relevant: 36

Used: 19



FACTORS INFLUENCING HIMS FUTURE

34%

Societal Pressures 92%

Advances in Technology

24%

Economic and Other Influences

Academia

Need for advanced Research and Development in HIM Incorporating new Technological advances into HIM curriculum

Careers

HIM Professionals – IT skills Reconfiguring the HIMS Department

Technology

Artificial Intelligence Machine Learning

Challenges

- Keeping up with fast-paced Technological advances
- Low adoption rates of new technologies by hospitals/providers
- HIM Research limited to pace of innovations in IT
- Revising Curriculum to meet future needs for HIMS
- Increased Privacy/Security Threats (Ransomware, cyberattacks)
- Unforced Errors (Alexa, Siri, Wearables etc.)
- Finding Talent
- Heavy initial investments for Organizations (AI, Talent etc.)
- Commodification of Health Information

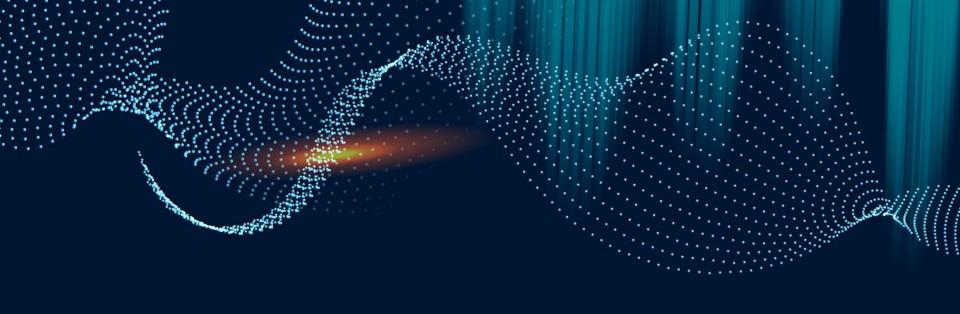
Before we Complain about the Challenges...

It wont hurt to look at the Problems that were associated with the Traditional Healthcare Systems

- Poor Quality of Health Information (Redundancy, Inconsistent Standards etc.)
- Accessibility of Health Information (time and place)
- Limited data collected in Health Records
- Lack of interoperability and cooperation between systems
- Inability to have Physician orders, Lab results, medical supplies, catalogs, patient histories, drug information etc. easily accessible
- Systems were designed to help with administrative work and not patients and doctors

Opportunities

- Commodification of Health Information Business
- Personalized HIM Patients will control their own data (Telemedicine)
- Increased/ Efficient Provider and Patient outcomes
- Ability to assess real-time data for patients and populations
- Predictive Analytics (Al and ML)
- Increased Transparency, Access and Mobility
- Cost Savings for Organizations (efficiencies, safety etc.)



03

The Future

Where are we Going

FUTURE TECH TRENDS

INTEGRATION & INTEROPERABILITY

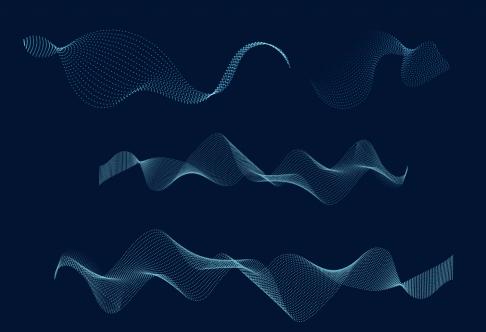
STANDARDIZATION

TELEHEALTH

BIG DATA & AI

WEARABLES & REAL-TIME ANALYTICS BLOCKCHAIN & VR SOFTWARE

DISCUSSION



POINTS TO PONDER:

- How will Future HIMS careers look like?
- How do we change our curriculum to meet future HIMS needs?
- What Role will Al play in Future HIMS
- Is the HIMS department sustainable as it is? Will it merge with IT?
- Are we asking the right questions?

Q & A





Information is the lifeblood of medicine and Health Information is destined to be the circulatory system for that information

- David Blumenthal

A SUMMARY



THANKS!

Do you have any questions? peter.muthama@comcast.net +2534954193







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REFERENCES

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<u>Forget Your Crystal Ball: How Can Leaders Really Prepare For The</u>
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Katerina Berezina, Ph.D., CHTP, CRME Robotics in Hospitality: Are We Asking The Right Questions? (hftp.org)

