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# Current and Future Usability Experience: Engaging Hospitals, Health Systems and Developers

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transforming healthcare through IT™



# 2011-2012 HIMSS Public Policy Principles

**Safety, Standards, Infrastructure, and Innovation:** Support research funding in the field of human factors related to EHRs and related technologies such as ordering, documentation, and decision support. Such research will allow development of evidence-based usability guidelines for EHRs.



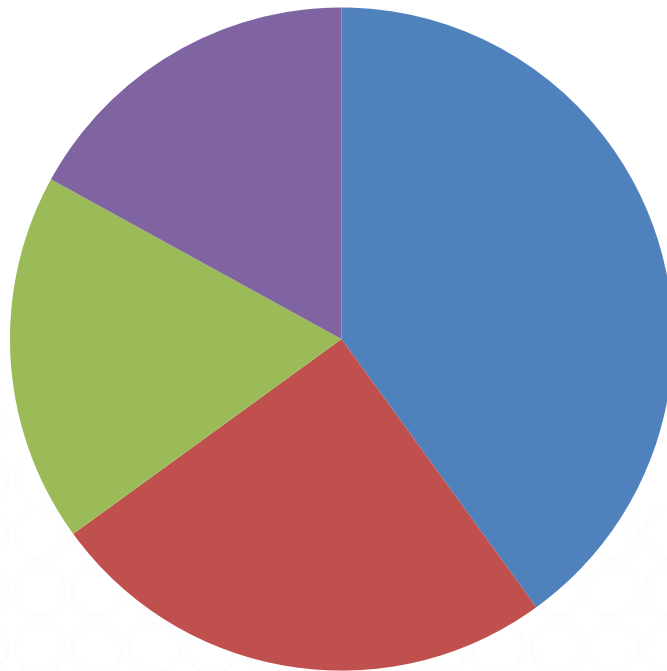
# Usability Task Force

Charge: To provide HIMSS membership and the healthcare industry with tools, resources and best practices related to EHR usability required for adoption and optimal use of health IT. [www.himss.org/usability](http://www.himss.org/usability)



# Usability Taskforce

## Membership



■ 40% Usability Industry

■ 25% Academia

■ 18% Provider

■ 17% HIT Industry



# Current Activities

- Website Re-org [www.himss.org/usability](http://www.himss.org/usability)
- Usability Maturity Model Survey
- Mobile Design Tenets
- Usability 101 Workshop: Applied Methods & Insights
- NIST Draft EHR Usability Protocol Response

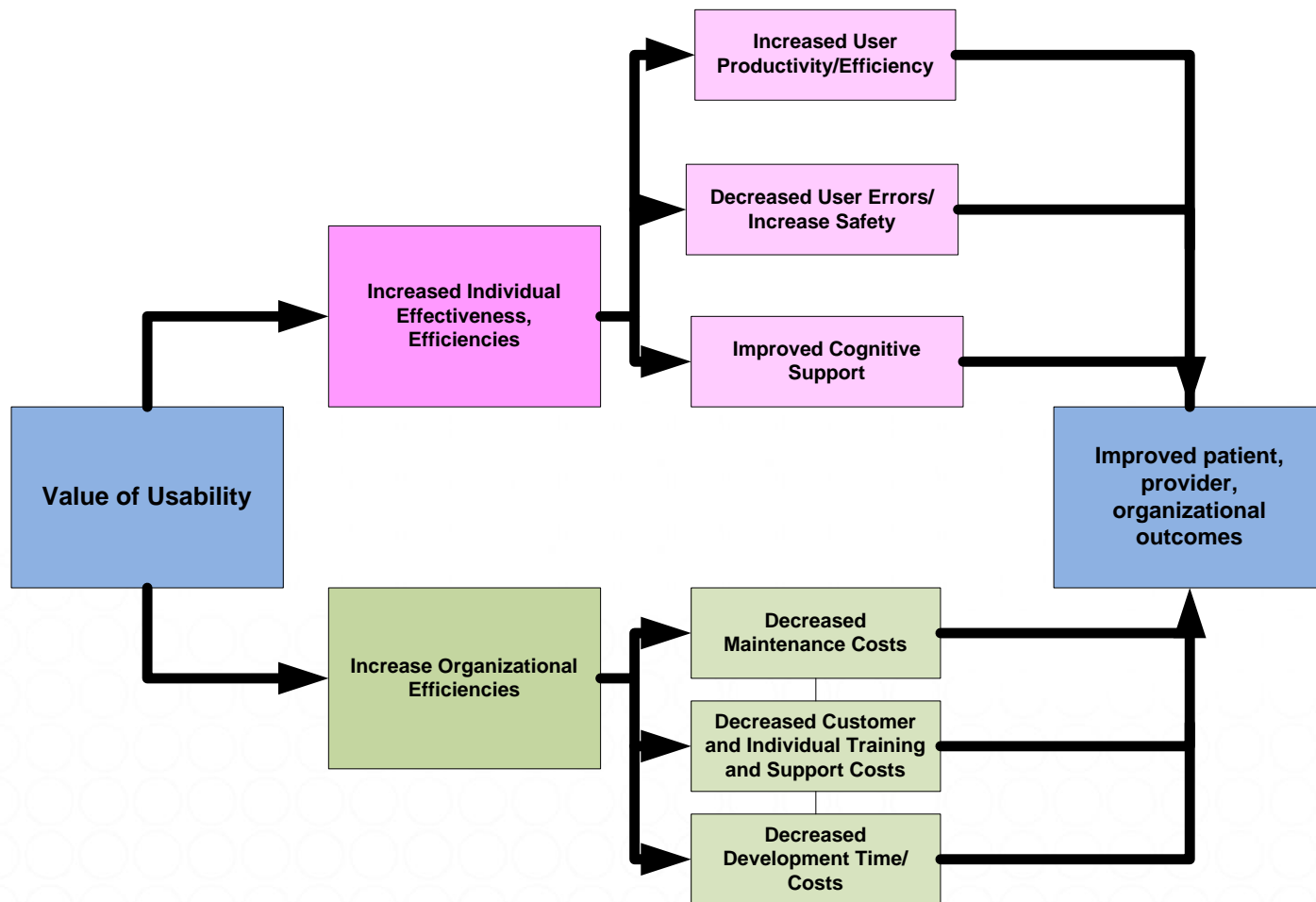


# Usability Maturity in Health Care

- How do we support the development, implementation and optimization of safe, efficient, effective systems and processes?
- How do we facilitate the movement of the health care & healthcare information technology industry through the maturity model?
- [himss.org/content/files/HIMSS\\_Promoting\\_Usability\\_in\\_Health\\_Org.pdf](https://www.himss.org/content/files/HIMSS_Promoting_Usability_in_Health_Org.pdf)



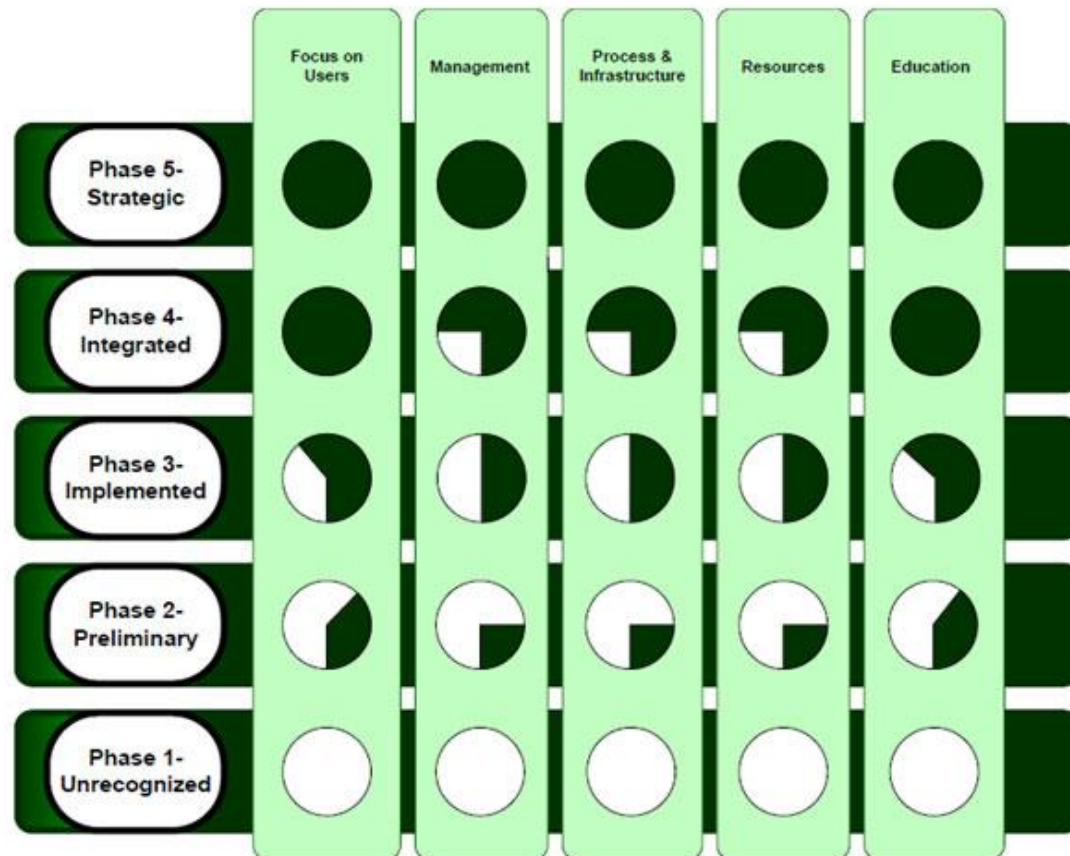
# Value of Usability to Healthcare Organizations







# Usability Maturity Model







# Usability Maturity Self-Assessment Survey

- Questionnaire identifying which phase in the usability maturity model an organization lies
- Hospital &/or health system personnel is target respondent
- Sample Questions:
  - Is your organization focused on health care teams as end users for major system implementations?
  - Is User Centered Design [UCD] recognized within the organization as an integral part of any system implementation?
  - Do the personnel doing usability work use standard methods and tools?



# Mobile Design

Provides guidelines for developing health information technology on handheld devices. The group has developed a series of webinars that highlight the key design tenets, as well as numerous examples of well-designed mobile apps and handheld hardware interfaces.



# Workshop

## Usability 101: Applied Methods & Insights

- HIMSS Annual Conference Monday, February 20<sup>th</sup> Las Vegas
- Target Participant: Analysts, Software Developers & Designers, Engineers, Product Managers, Consultants customizing & implementing EHRs
- Hands-on, interactive workshop focusing on real-world scenarios in measuring the effectiveness, efficiency and satisfaction of the user experience with an EHR. Cover usability research methods across the design/development software application timeline. Attention will be given to matching the appropriate usability research method to the associated phase of software development.



# Workshop

## Usability 101: Applied Methods & Insights

- Research Methods
  - Ethnographic Field Studies
  - Work Flow Analysis – Time & Motion Study
  - Building Personas
  - Focus Groups
  - Survey
  - Card Sorting
  - Formative 1 on 1 usability testing
  - Heuristic/Expert Review
  - A B Testing
  - Summative 1 on 1 usability testing



# Workshop

## Usability 101: Applied Methods & Insights

- Collaborators:
  - American Medical Informatics Association (AMIA)
  - Human Factors and Ergonomics Society (HFES)
  - Usability Professionals Association (UPA)
  - *National Institute of Standards & Technology NIST*



# NIST Draft Guidance Response

- Technical Evaluation, Testing and Validation of the Usability of Electronic Health Records (NISTIR 7804)
- Oct 26<sup>th</sup> 3pm HIMSS member meeting to gather comments for response
- Oct 27<sup>th</sup> NIST educational seminar on draft guidance 2pm
- Nov 10<sup>th</sup> Comments due





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# Questions &/or Suggestions

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