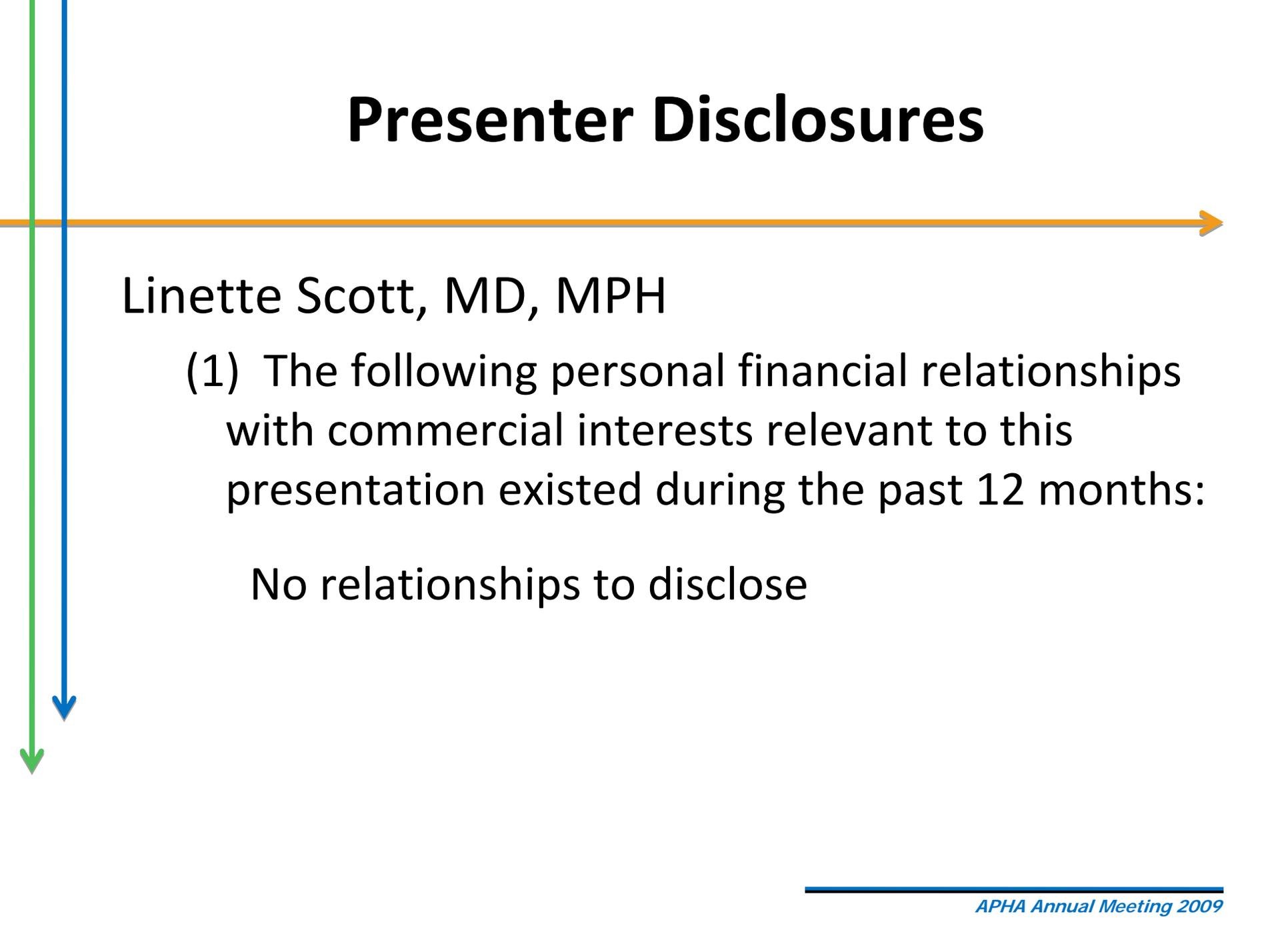


# Electronic Health Records: Why are they important?

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November 9, 2009

# Presenter Disclosures

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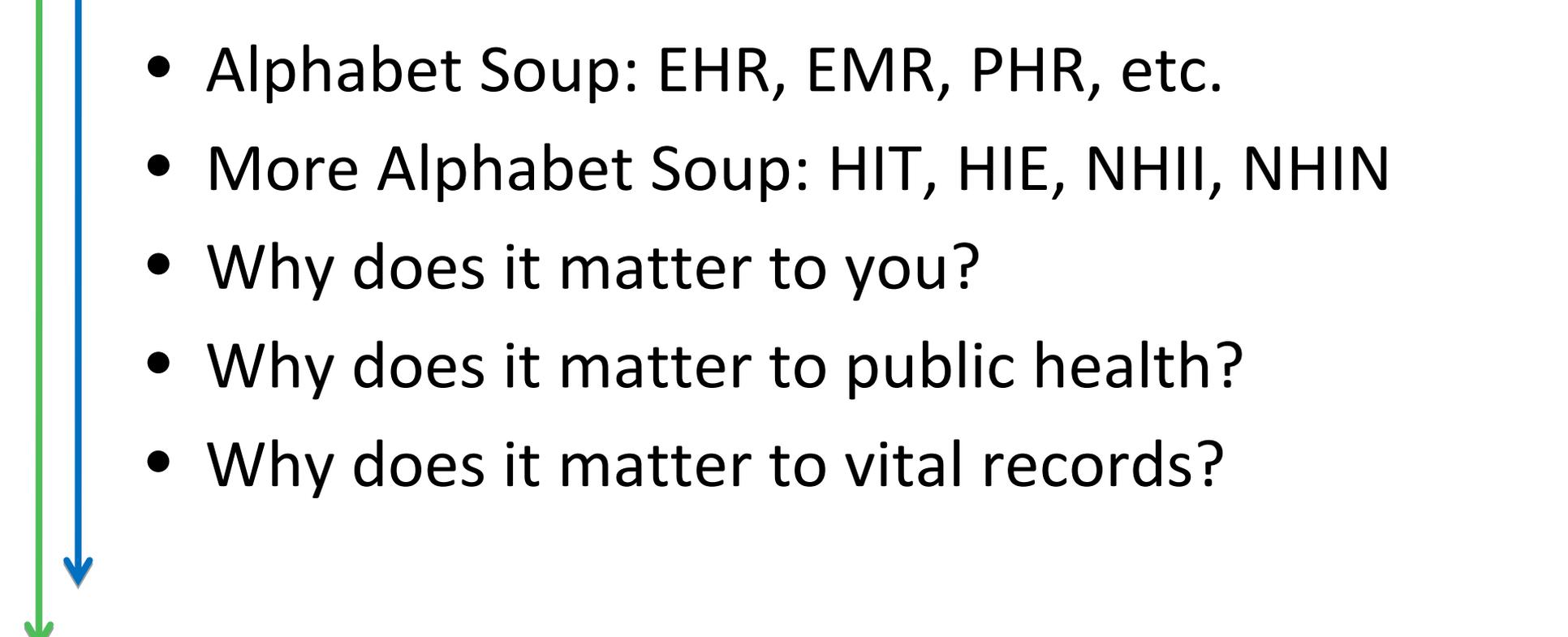
Linette Scott, MD, MPH

(1) The following personal financial relationships with commercial interests relevant to this presentation existed during the past 12 months:

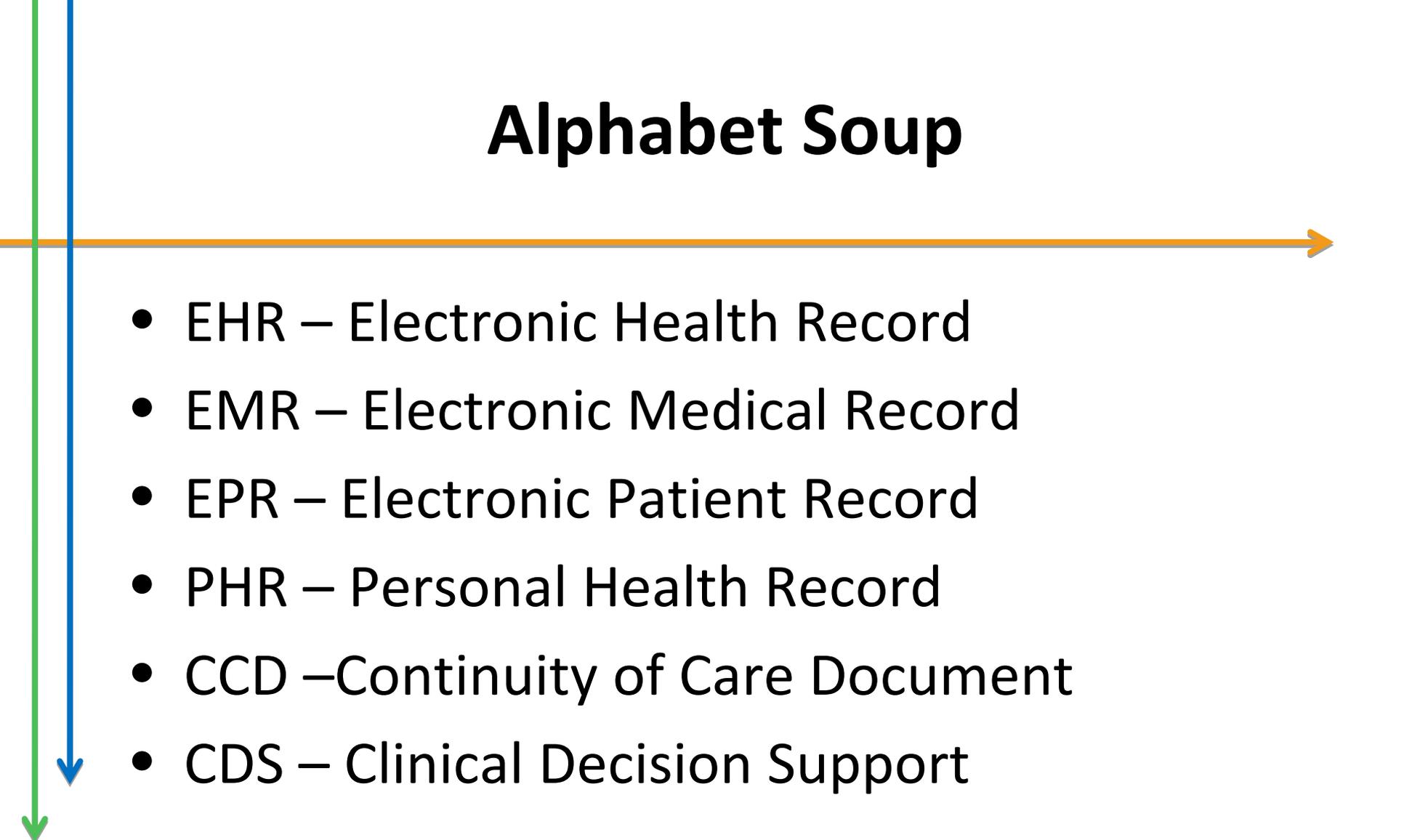
No relationships to disclose

# Overview



- Alphabet Soup: EHR, EMR, PHR, etc.
  - More Alphabet Soup: HIT, HIE, NHII, NHIN
  - Why does it matter to you?
  - Why does it matter to public health?
  - Why does it matter to vital records?
- 

# Alphabet Soup



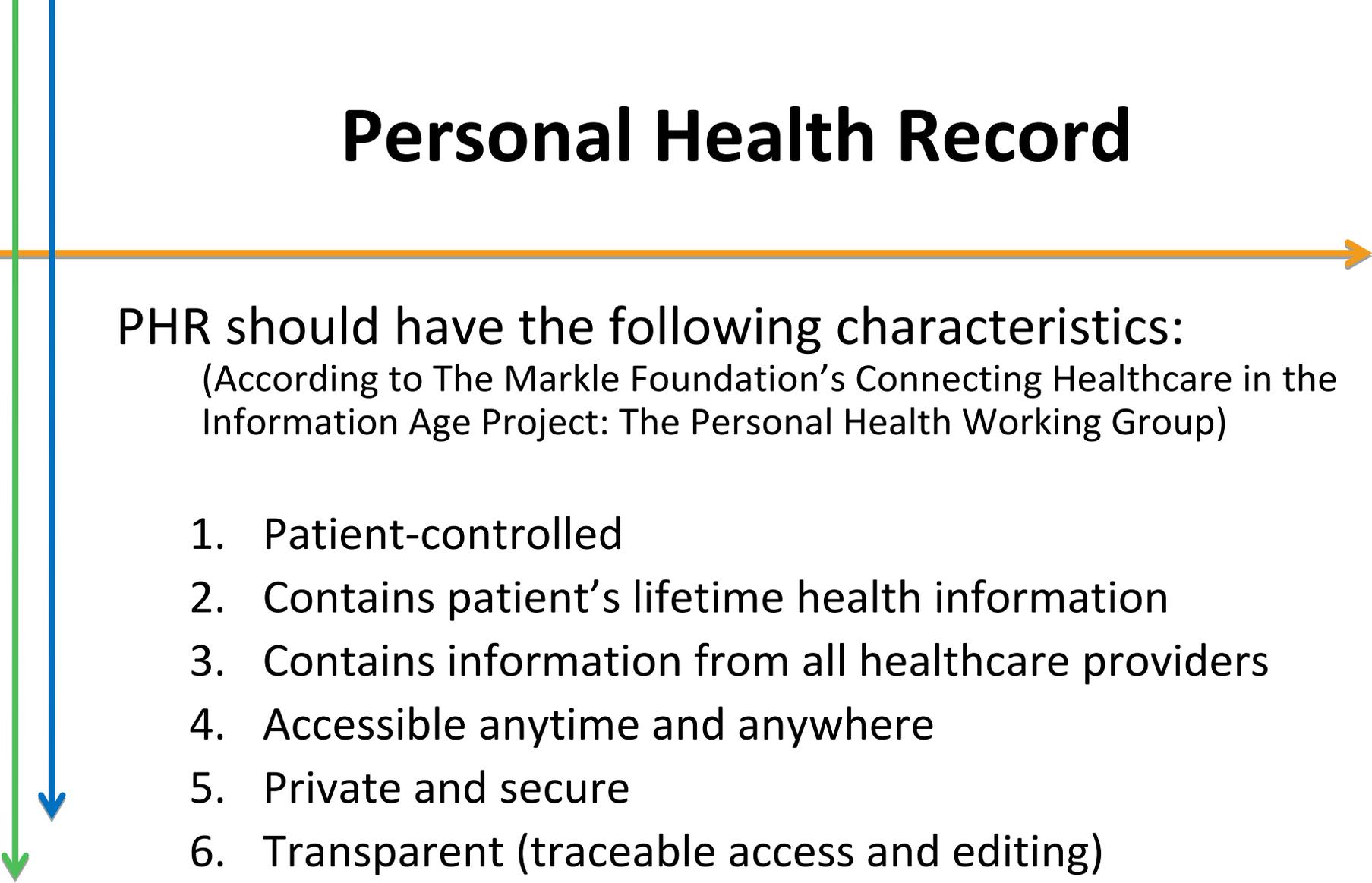
- EHR – Electronic Health Record
- EMR – Electronic Medical Record
- EPR – Electronic Patient Record
- PHR – Personal Health Record
- CCD –Continuity of Care Document
- CDS – Clinical Decision Support

# Electronic Health Record



- Electronic Health Records (EHR)  
Electronic Medical Records (EMR)  
Electronic Patient Records (EPR)
- Records are electronic, structured, secure and accessible
- Owned by providers/facilities
- Linked together by a patient identifier

# Personal Health Record

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PHR should have the following characteristics:

(According to The Markle Foundation's Connecting Healthcare in the Information Age Project: The Personal Health Working Group)

1. Patient-controlled
2. Contains patient's lifetime health information
3. Contains information from all healthcare providers
4. Accessible anytime and anywhere
5. Private and secure
6. Transparent (traceable access and editing)
7. Interoperable

# Continuity of Care Document (CCD)

## *A Possibility*

- Continuity of Care Document (CCD) and its associated HL7 standard developed by the Health Information Technology Standards Panel (HITSP).
- Stores most relevant patient information
- Technology neutral – XML-based
- Completed by authorized healthcare personnel
- Collection of clinical information from different documents

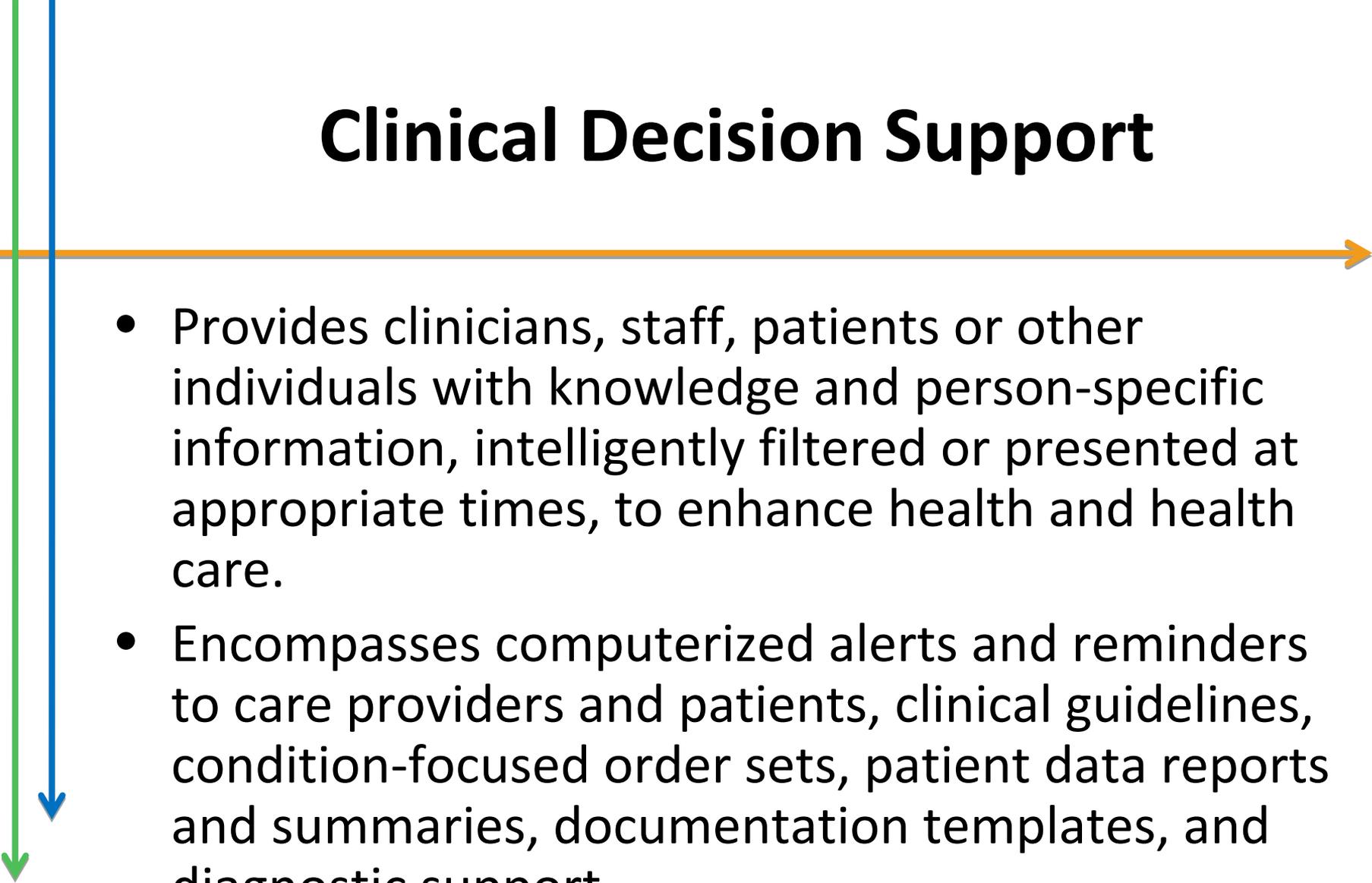
# Continuity of Care Document (CCD)



Includes:

- Current medical problems
- Procedures
- Family history
- Social history
- Payers
- Advance directives
- Alerts (allergies, adverse reactions)
- Medications
- Immunizations
- Medical equipment
- Vital signs
- Functional status
- Results
- Encounters
- Plan of care

# Clinical Decision Support

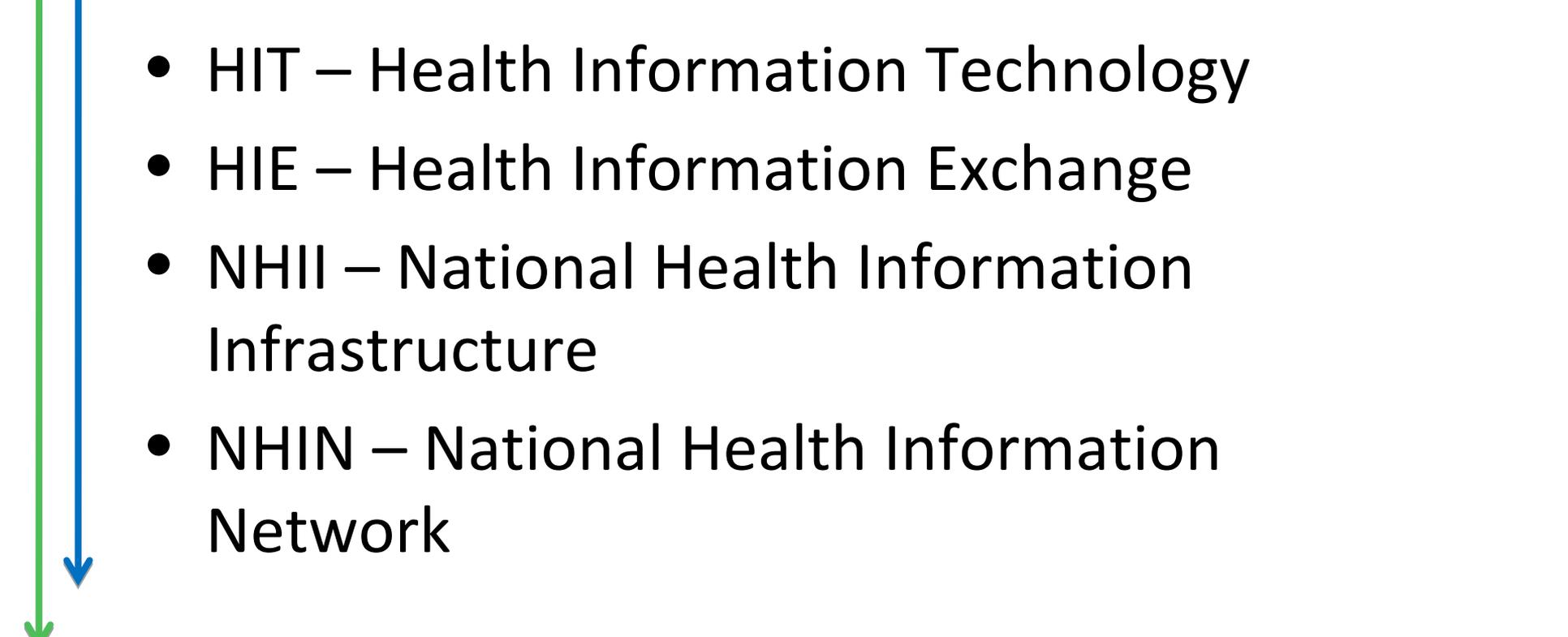
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- Provides clinicians, staff, patients or other individuals with knowledge and person-specific information, intelligently filtered or presented at appropriate times, to enhance health and health care.
- Encompasses computerized alerts and reminders to care providers and patients, clinical guidelines, condition-focused order sets, patient data reports and summaries, documentation templates, and diagnostic support.

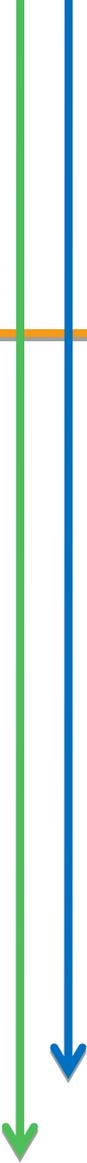
<http://healthit.hhs.gov>

# More Alphabet Soup



- HIT – Health Information Technology
  - HIE – Health Information Exchange
  - NHII – National Health Information Infrastructure
  - NHIN – National Health Information Network
- 

# Translating Soup

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So ...

**Health Information Technology**

is used for

**Health Information Exchange**

which moves through the

**National Health Information Network**

which sits on the

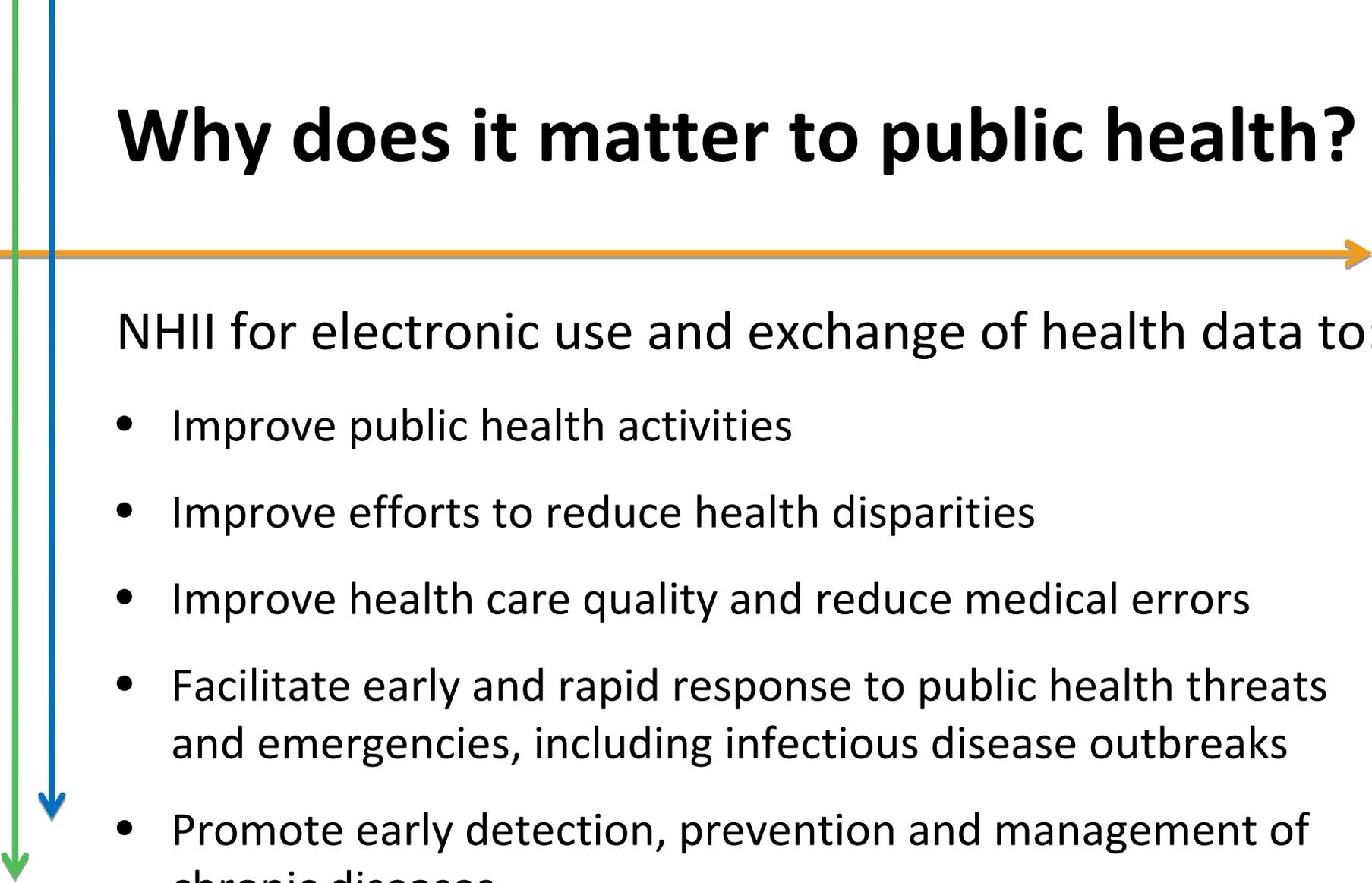
**National Health Information Infrastructure.**

# Why does it matter to you?



- My doctor knows my medications.
  - I know my lab results.
  - The computer speaks when I can't.
  - My doctor is warned when it isn't the right medication for me.
  - My doctor is reminded to check my labs before giving me the medicine.
- 

# Why does it matter to public health?

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NHII for electronic use and exchange of health data to:

- Improve public health activities
- Improve efforts to reduce health disparities
- Improve health care quality and reduce medical errors
- Facilitate early and rapid response to public health threats and emergencies, including infectious disease outbreaks
- Promote early detection, prevention and management of chronic diseases

*ARRA HITECH Bill*

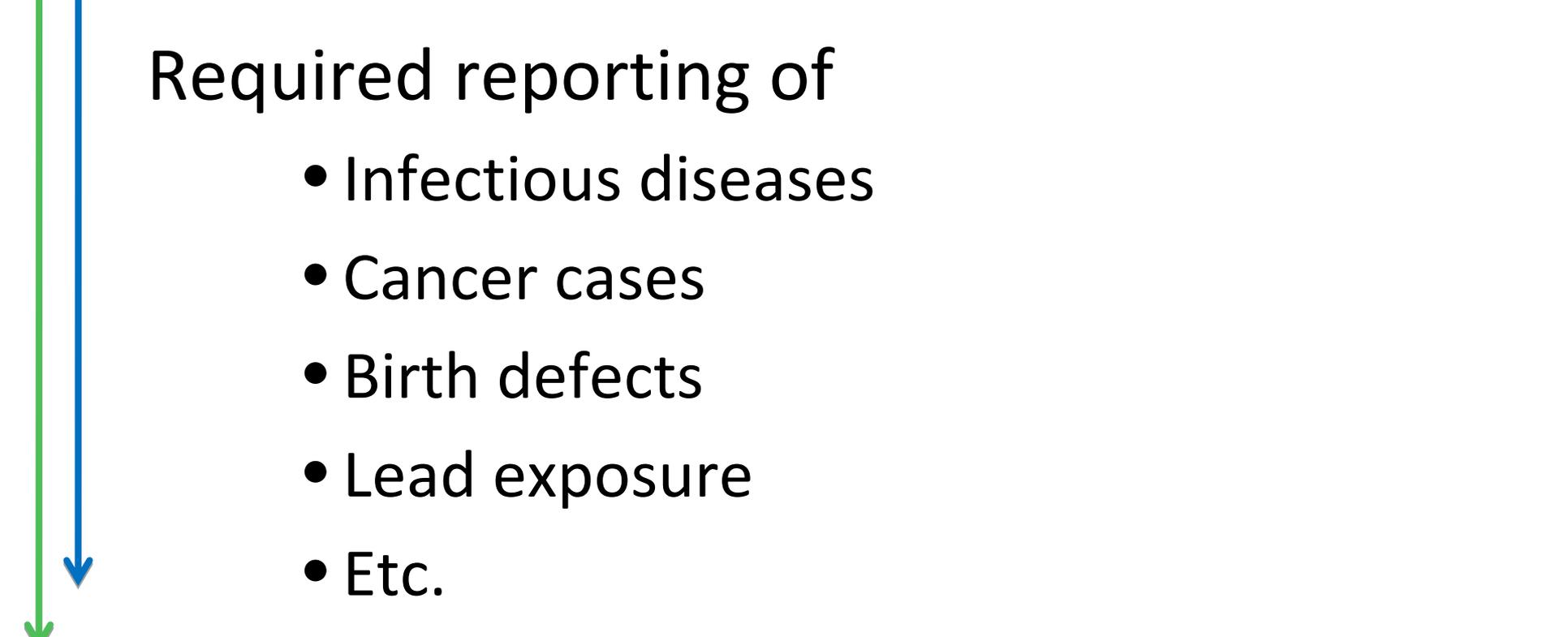
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*APHA Annual Meeting 2009*

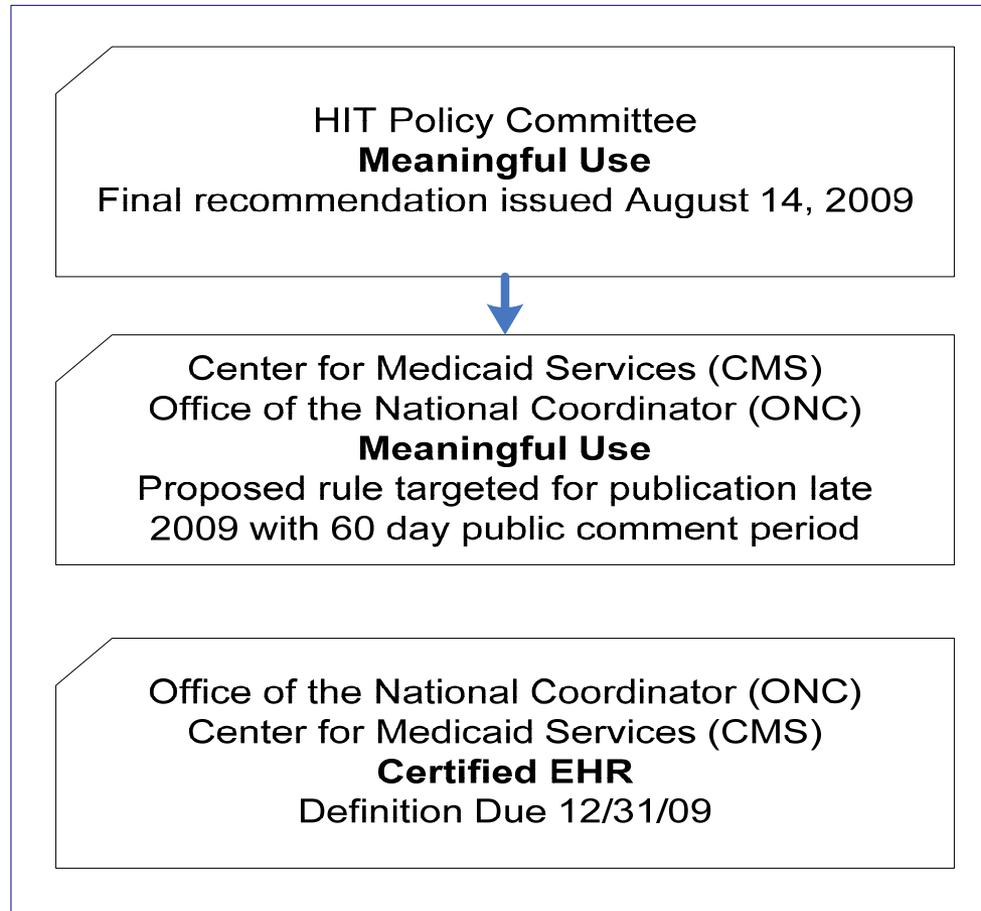
# Meet Public Health Reporting



Required reporting of

- Infectious diseases
  - Cancer cases
  - Birth defects
  - Lead exposure
  - Etc.
- 

# Federal Standards on the way!

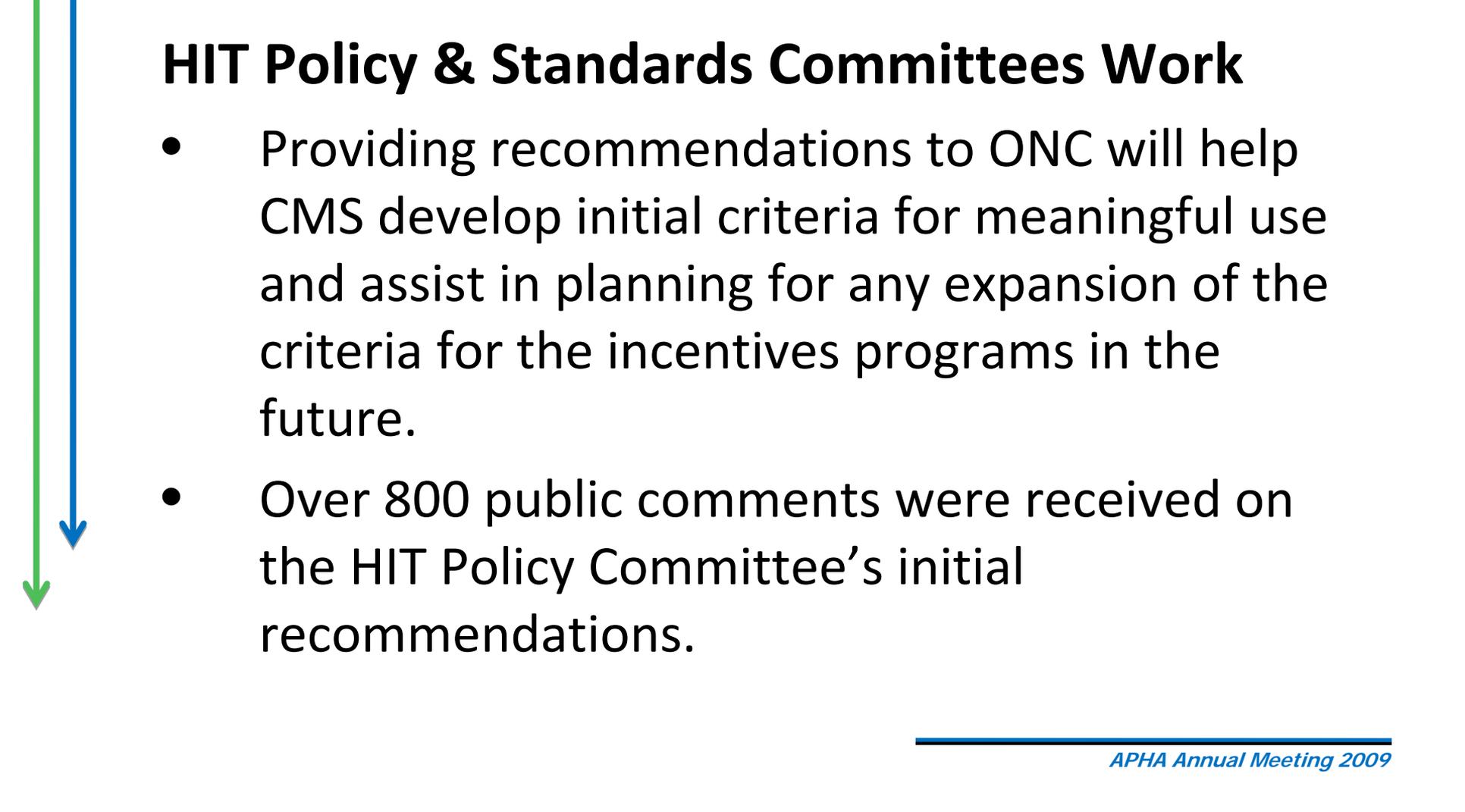


## Federal Standards

# Federal Committees Impact Public Health



## HIT Policy & Standards Committees Work

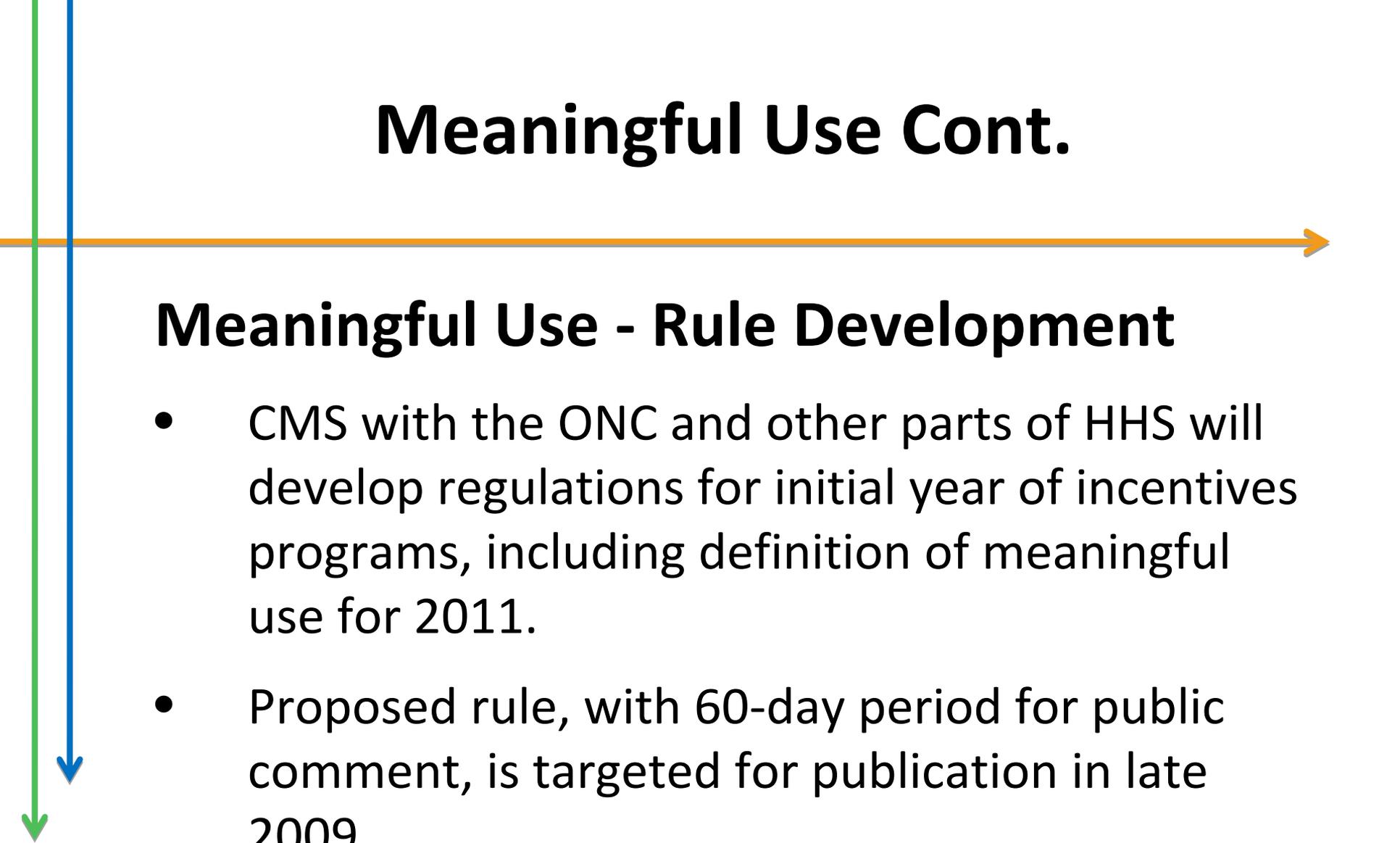
- Providing recommendations to ONC will help CMS develop initial criteria for meaningful use and assist in planning for any expansion of the criteria for the incentives programs in the future.
  - Over 800 public comments were received on the HIT Policy Committee's initial recommendations.
- 

# Meaningful Use



- **Meaningful Use – HIT Policy Committee**
  - Final recommendation issues August 14, 2009
- **Proposed 2011 Measures - Examples**
  - % of patients with recorded BMI
  - % smokers offered smoking cessation
  - Stratify reports by gender, insurance type, primary language, race ethnicity
  - Report up-to-date status for childhood immunizations
  - % reportable lab results submitted electronically

# Meaningful Use Cont.

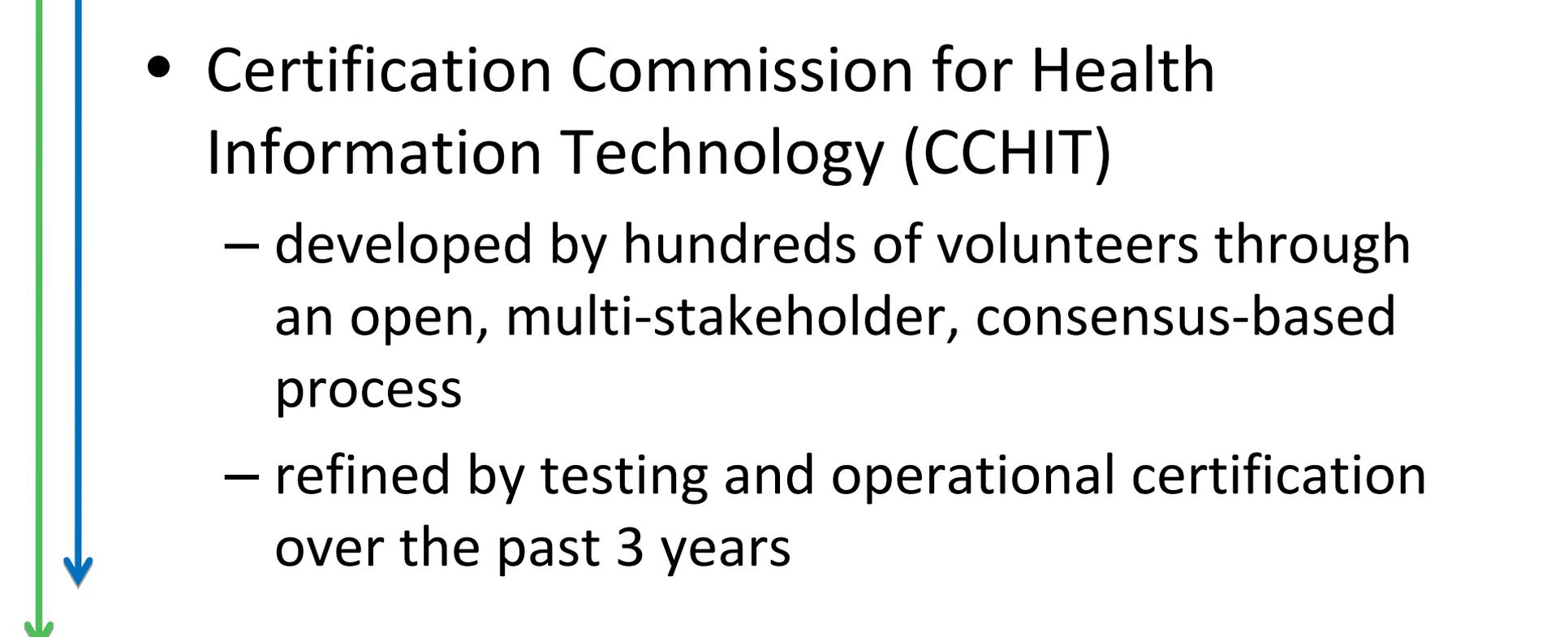


## Meaningful Use - Rule Development

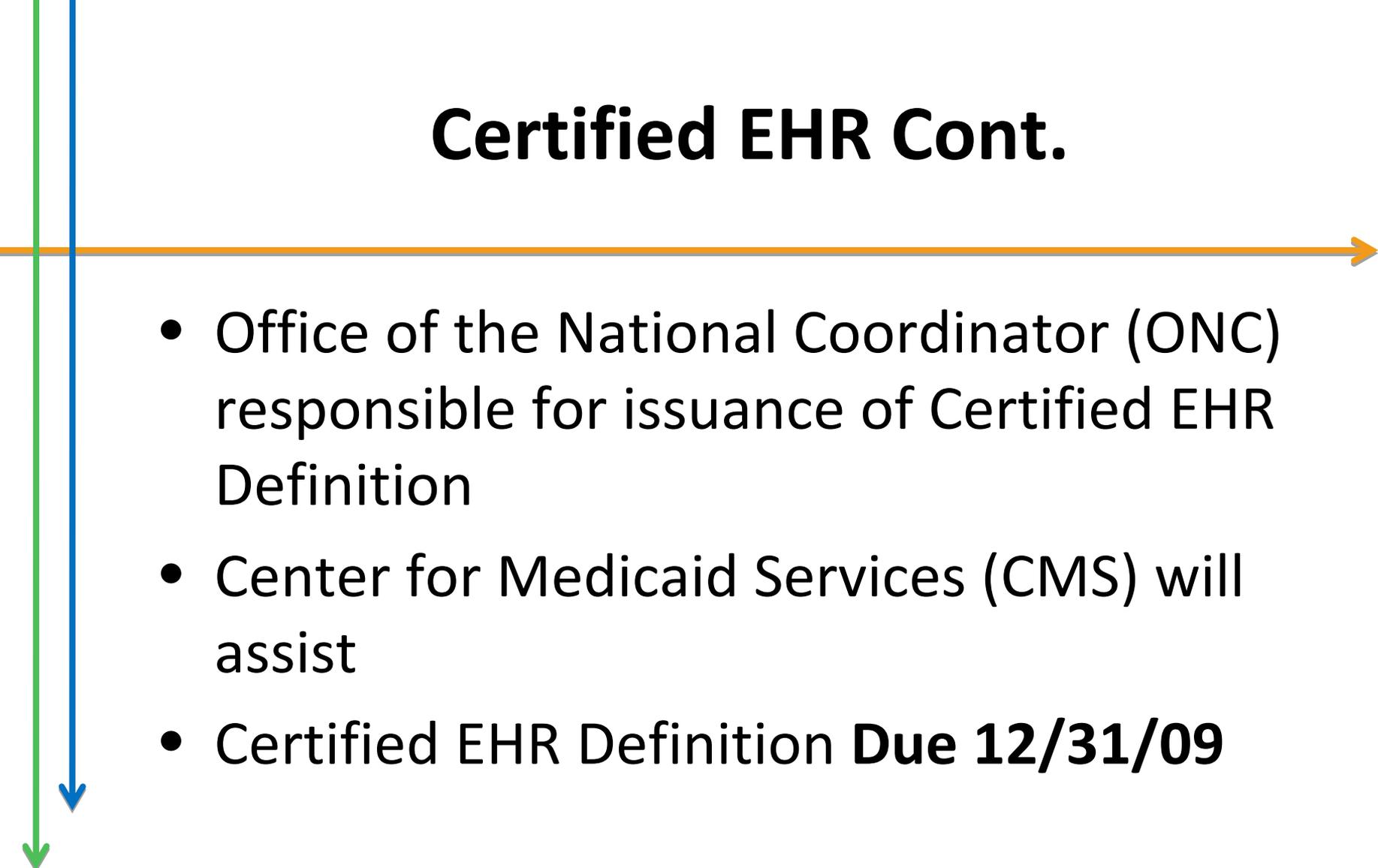
- CMS with the ONC and other parts of HHS will develop regulations for initial year of incentives programs, including definition of meaningful use for 2011.
- Proposed rule, with 60-day period for public comment, is targeted for publication in late 2009.

# Certified Electronic Health Record (EHR)



- Certification Commission for Health Information Technology (CCHIT)
    - developed by hundreds of volunteers through an open, multi-stakeholder, consensus-based process
    - refined by testing and operational certification over the past 3 years
- 

# Certified EHR Cont.



- Office of the National Coordinator (ONC) responsible for issuance of Certified EHR Definition
- Center for Medicaid Services (CMS) will assist
- Certified EHR Definition **Due 12/31/09**

# Certified EHR Cont.



The ARRA definition is:

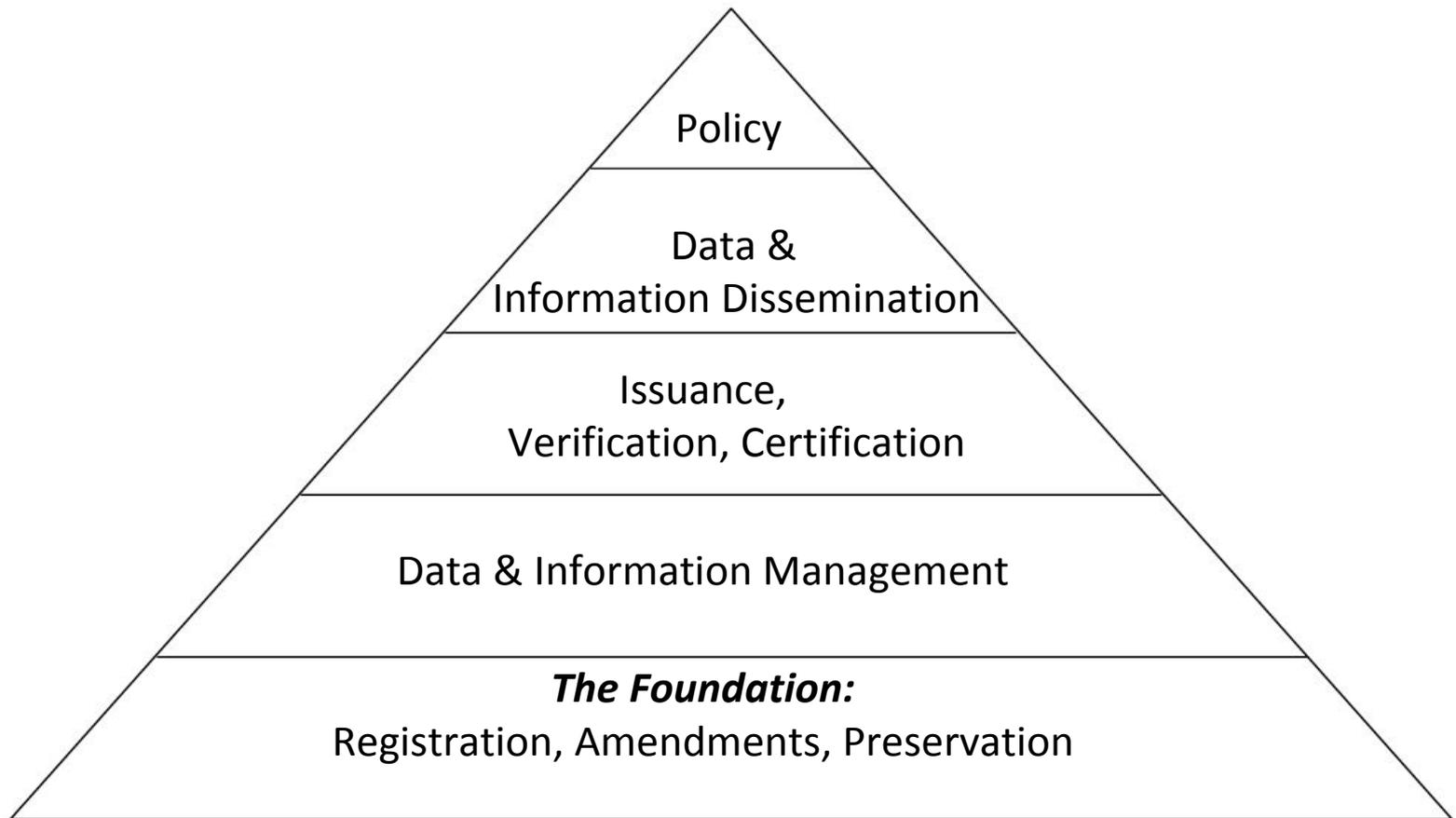
- (13) QUALIFIED ELECTRONIC HEALTH RECORD.—The term ‘qualified electronic health record’ means an electronic record of health-related information on an individual that—
    - (A) includes patient demographic and clinical health information, such as medical history and problem lists; and
    - (B) has the capacity—
      - (i) to provide clinical decision support;
      - (ii) to support physician order entry;
      - (iii) to capture and query information relevant to health care quality; and
      - (iv) to exchange electronic health information with, and integrate such information from other sources.
- 

# EHRs and Vital Records



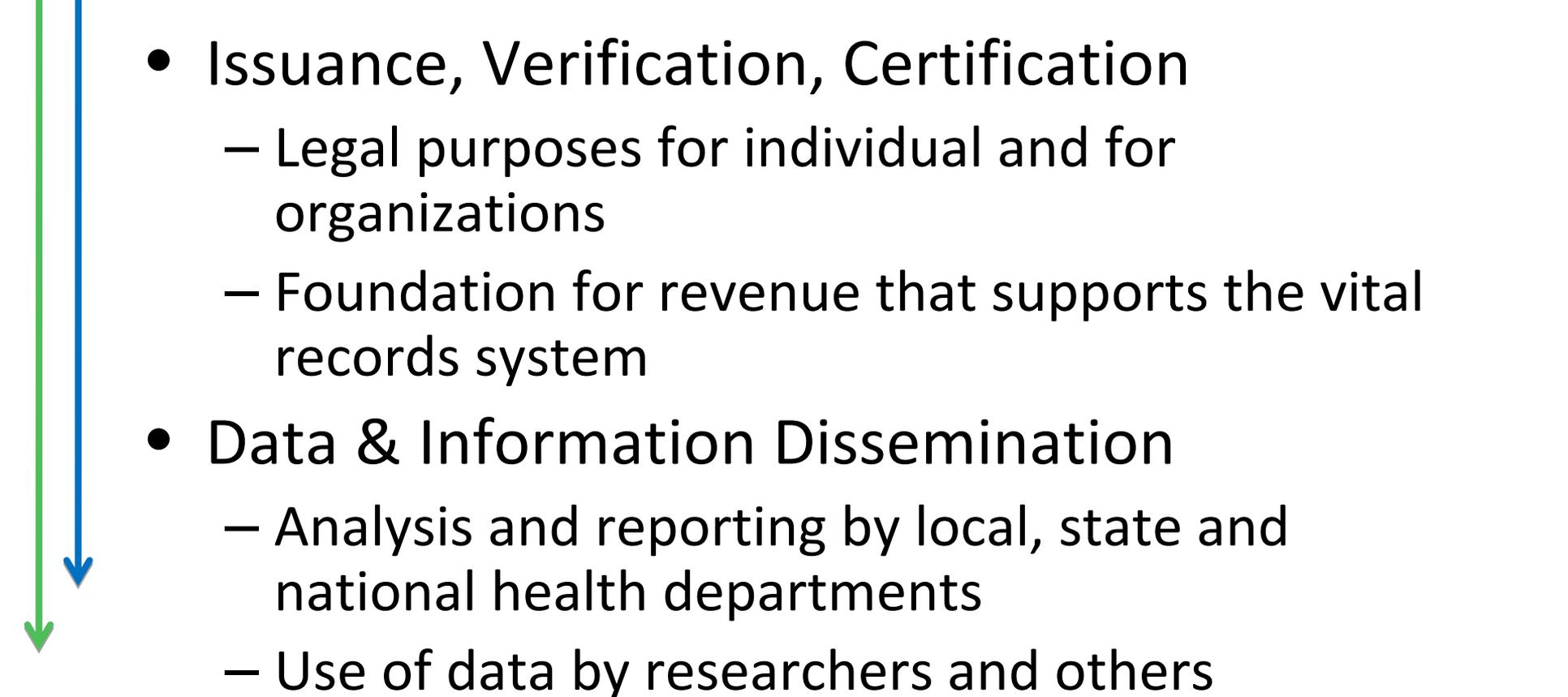
- EHRs will capture information that must be reported for Vital Record Events
- Meaningful Use requirements will drive availability of each data field
- Standards will be drivers for NHIN
- Vital records must be able to receive information through HIE and contribute to it

# State Vital Record Programs



# Vital Record Uses



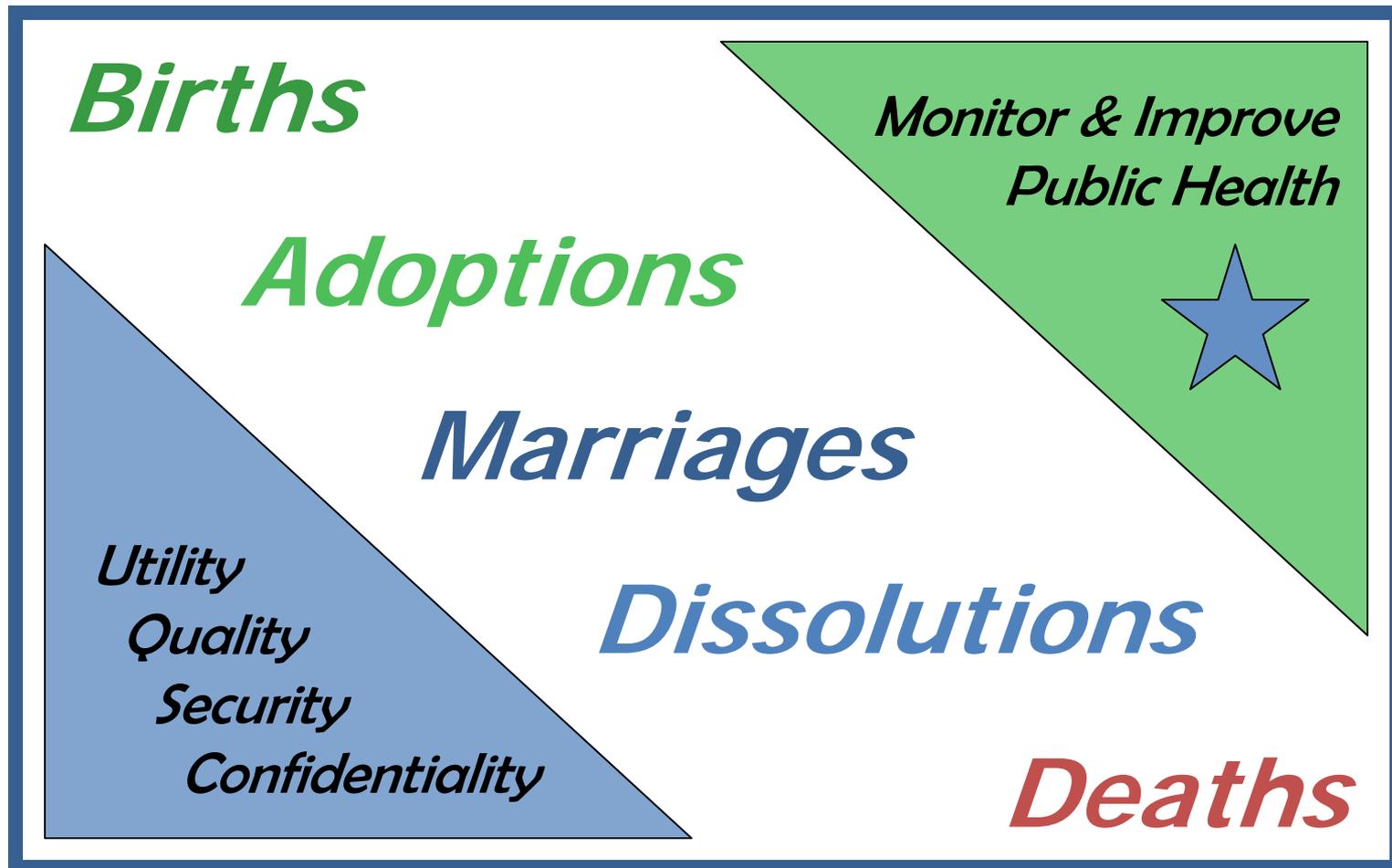
- Issuance, Verification, Certification
    - Legal purposes for individual and for organizations
    - Foundation for revenue that supports the vital records system
  - Data & Information Dissemination
    - Analysis and reporting by local, state and national health departments
    - Use of data by researchers and others
- 

# Vital Records Support Many Services



- Population Census
  - Diseases & Conditions
  - Identity
  - Fraud Prevention
  - Surveillance
  - Age
  - Market Analysis
  - Quality Assurance
- 

# Vital Records



# Why does HIE matter to vital records?



- The beginning and the end of life ...  
and electronic health records
  - Birth records as linkage points to  
facilitate the Master Patient Index
  - Vital records has one ... going on two ...  
successful national health information  
exchanges: EVVE and STEVE
- 

# Electronic Verification of Vital Events (EVVE)



Federal and State agencies rely on birth certificates for:

- proof of age
- proof of citizenship
- identification for employment purposes
- to issue benefits or other documents (e.g. driver's licenses, Social Security cards, and passports)
- to assist in determining eligibility for public programs or benefits

EVVE is:

- Electronic system that allows immediate confirmation of information on a birth certificate presented by an applicant to a government office anywhere in the nation irrespective of the place or date of issuance
- Developed by the National Association for Public Health Statistics and Information Systems (NAPHSIS)
- Also capable of supporting the electronic verification and/or electronic certification of death records



# State and Territorial Exchange of Vital Events (STEVE)

- Currently deployed in 9 jurisdictions, with up to 20 jurisdictions planned by early 2010
- California alone sends notification of 120,000+ deaths/year to birth jurisdictions (>300 reams of paper)
- STEVE allows exchange of information through messaging (electronic mailboxes)
- Receiving partners will only receive data elements they are legally allowed to use

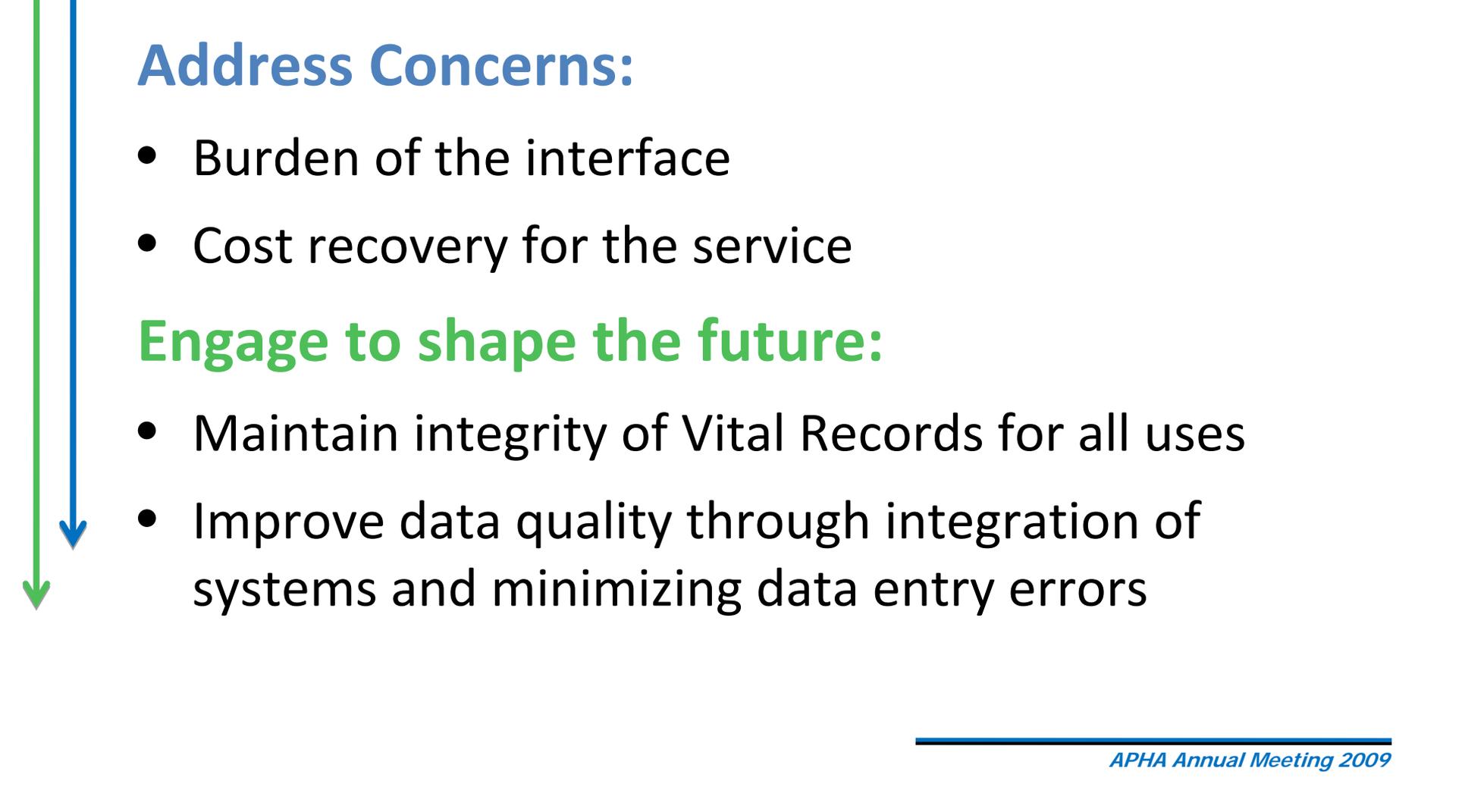
# Next Steps for Vital Records



## Address Concerns:

- Burden of the interface
- Cost recovery for the service

## Engage to shape the future:

- Maintain integrity of Vital Records for all uses
  - Improve data quality through integration of systems and minimizing data entry errors
- 



***Thank you!***