2014 AHIMA Convention & Exhibit

Leading the Way to Health Intelligence

IIS and HIEs: Is There a Future Together?

Noam H. Arzt, HLN Consulting, LLC
Bill Brand, Public Health Informatics Institute

AHIMA
American Health Information
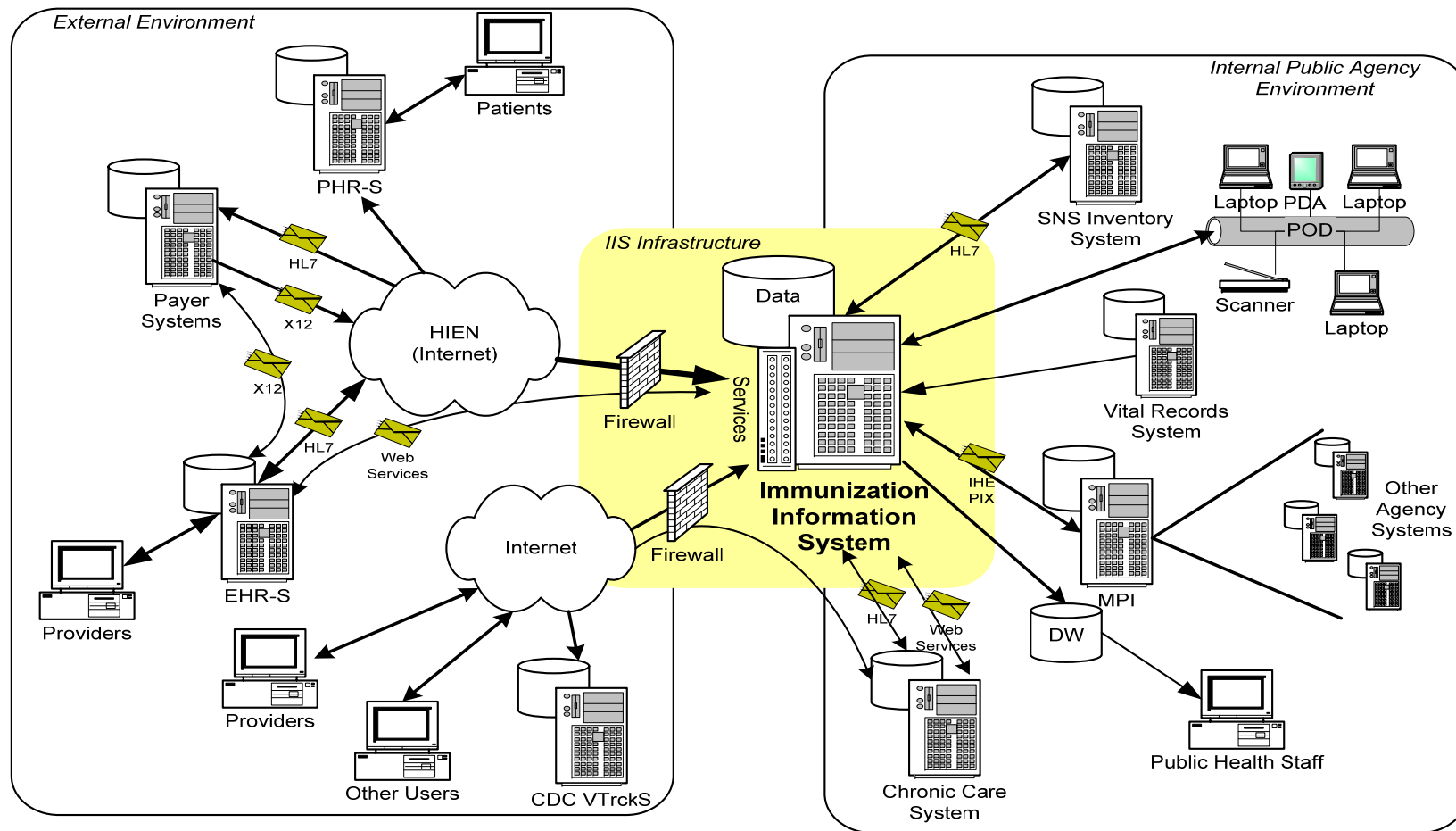Management Association®

Session Outline

- Introduction: Setting the Stage
- Immunization Information System (IIS) Overview
- Health Information Exchange (HIE) Overview
- IIS-HIE Collaboration
- Conclusion: Is there a Future Together?

Introduction

- CDC IIS Definition: "...confidential, population-based, computerized databases that record all immunization doses administered by participating providers to persons residing within a given geopolitical area."
- IIS projects are interoperability projects
- Effect of CMS EHR Incentive Programs
- Growth of HIEs

IIS Functional Vision

IIS Functional Vision

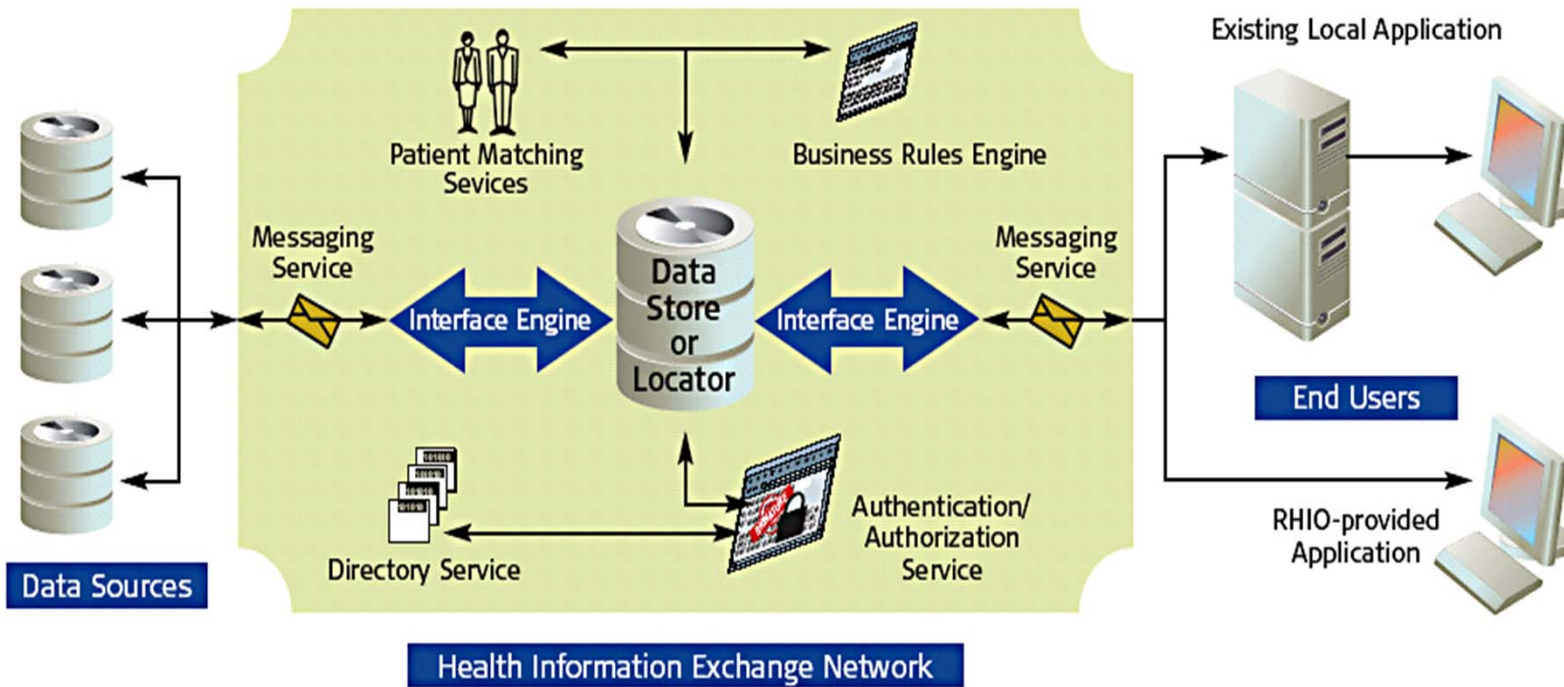|	**Data Destination**	
	EHR-S	IIS
IIS	Priority #2: EHR Query/ Response (Stage 3 MU?); Potential IIS "Push"	"Push" or "Pull" Supports Inter-state Interoperability
EHR-S	Limited Interest "Push", e.g. via Direct	Priority #1: "Push" to satisfy Stage 1 MU; IIS query less interesting

Data Source
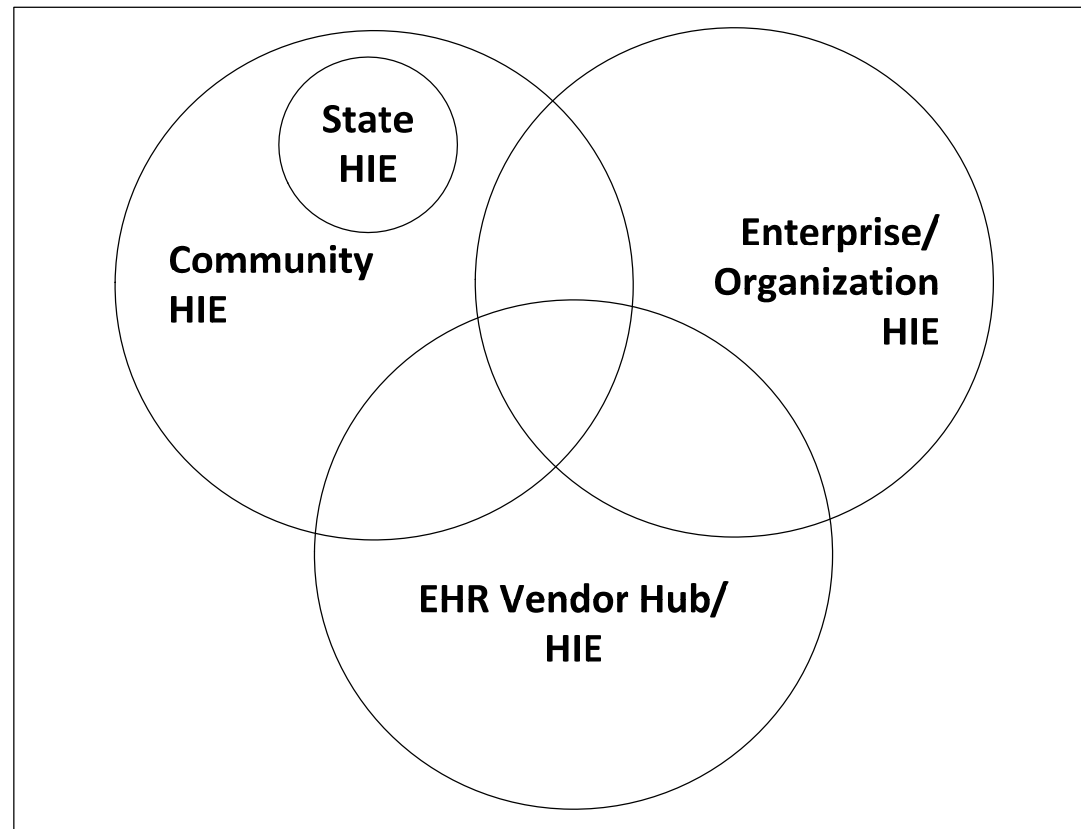
Data Destination

Figure 2

National IIS Landscape

- All 50 states (shortly) plus US territories

- CDC Functional Standards (revised 2013)

- American Immunization Registry Association (AIRA)

- State IT organizational consolidation

- Funding uneven and idiosyncratic

HIE Overview

HIE Overview

State HIE

Community HIE

Enterprise/ Organization HIE

EHR Vendor Hub/ HIE

HIE-IIS Collaboration

What Do IIS Have to Gain?

- **Achieve Public Health Goals** of increased data collection and dissemination.

- **Support meaningful use** and other objectives of the CMS EHR Incentive Program since many of the interoperability objectives and measures involve public health.

- **Connectivity:** Many of public health's data trading partners will choose to interoperate with an HIE and reduce (or eliminate!) what they may perceive to be superfluous, and perhaps costly, additional connections, even to public health.

- **New Sources of Data:** Public health can gain access to data and trading partners who previously might not have participated in its initiatives.

- **Inclusion:** It's better to be an insider than an outsider: As the healthcare community moves in this direction, public health should be an active participant—or risk being left out of the network.

What Do HIEs Have to Gain?

- **"Quick start":** By leveraging existing public health interoperability activities, including interfaces to labs and providers, HIEs can move ahead more quickly with interface deployment.

- **Existing data:** PHAs already have systems and applications that have consolidated and population-based data, including master person index systems, that can be leveraged .

- **Expertise:** PHAs have experience in key technical areas that are critical to HIE operations and success, including patient matching and de-duplication, database management, web-based portal development and support, and HL7 messaging.

- **Existing relationships:** PHAs have developed coalitions of stakeholders, including providers, payers, professional associations, and even citizens.

- **Governance:** PHAs have experience in negotiating and implementing data sharing agreements.

IIS-HIE Collaboration

Survey/Interview results (2012)*:

- Fifty (94.3%) IIS programs reported that sharing of immunization data between their IIS and HIEs was implemented or contemplated.
- Thirty-six (67.9%) programs already had authority to exchange data with HIEs in their jurisdiction:
    - In 15 (41.7%) the authority was derived from a data exchange agreement only
    - In 13 (36%) the authority was derived from general public health laws
    - In 9 (25%) the authority was derived from a specific statute or regulation
- Seven (19.4%) programs reported that they did not know whether they had authority to share immunization information with HIEs in their jurisdiction
- 1 program responded that the question was not applicable because the HIE was merely a conduit for data transmission.

* Martin, Daniel W, et al., *Immunization Information Systems: A Decade of Progress in Law and Policy*, J Public Health Management Practice, 2013, 00(00), 1-8.

IIS-HIE Collaboration

Interview results (2013):*

- Effective partnership is the key determinant to success
- No "one size fits all" technical solution exists for successful HIE-IIS data exchange
- IIS are seen as the authoritative source of immunization information
- True bi-directional exchange through an HIE is not yet generally a reality, but some early examples do exist
- Both HIEs and IISs are challenged to meet on-boarding demand

* Arzt, Noam H. and Danielle Reader-Jolley, *Building Effective IIS-HIE Relationships: Findings from a Nationwide Telephone Survey,* American Immunization Registry Association (AIRA) 2013 National Meeting, Denver, CO, October 8, 2013. <http://www.hln.com/assets/pdf/AIRA-2013Conference-IIS-HIE.pdf>

IIS-HIE Collaboration

Interview recommendations (2013):

- When mutual value can be demonstrated, develop consistent and shared messages to providers of how the HIE and IIS are working together to support information exchange and enhance quality of care.

- Agree upon the respective areas of expertise.

- Don't compromise IIS *or* HIE functionality when partnering.

- Identify mutually agreeable and appropriate roles for on-boarding providers.

- Involve public health in HIE at both governance and technical levels.

- Carefully review the respective laws, policies and regulations related to health information disclosure and mandatory reporting requirements.

- Future IIS/HIE partnerships should prioritize comprehensive messaging strategies to minimize the impact on provider practices.

IIS-HIE Participation Matrix

		Receive Data	
		No	**Yes**
Send Data	**Yes**	Good Samaritan	Full Participant
	No	Non-Participant	Opportunist

Is There a Future Together?

- Communicate whether you collaborate or not
- Know when to compromise, and when to stick to your guns
- Leverage where it's sensible
- Strive for coherence from the customer's point of view
- Be civil and respectful