eHealth Exchange™

The Unique Value Proposition of a Health Data Exchange
that Works with the Healthcare Industry *and* the Government

The Sequoia Project's Role

As a non-profit with a public mission, Sequoia is a trusted, independent convener of industry and government.

Works to address the challenges of secure, interoperable nationwide health information exchange (HIE).

SECURE

INTEROPERABLE

NATIONWIDE

The Sequoia Project Initiatives

The Sequoia Project's independent initiatives each have their own:

- **Mission**
- **Governance**
- **Membership**
- **Structure**

The Sequoia Project is an ideal home for projects that require a collaborative environment where multiple parties with differing perspectives can work together.

Current Sequoia Project Initiatives

eHealth Exchange™

The **eHealth Exchange** is one of the largest public-private health information networks in America.

carequality

Carequality is a national-level interoperability framework and common agreement to link all health information networks

RSNA® Image Share VALIDATION

RSNA Image Share Validation Program is an interoperability testing program to enable seamless sharing of medical images.

PULSE
Patient Unified Lookup System for Emergencies

PULSE is a system which enables disaster healthcare volunteers to treat individuals displaced by disasters

What is the eHealth Exchange™

The eHealth Exchange is a **health data sharing network**. It is one of many that exist throughout the United States

It provides a common set of standards, legal agreements and a governance framework that sets the groundwork for participants to securely share health data

But don't be fooled. The eHealth Exchange is no ordinary network….

The Largest Public-Private Health Information Network

eHealth Exchange™

We connect:

All 50 States	70,000 Medical Groups
Four Federal Agencies (DoD, VA, CMS, SSA)	3,400+ Dialysis Centers
75% of U.S. Hospitals	8,300 Pharmacies

Supporting more than 120 million patients

59 Regional and State HIEs

How the eHealth Exchange™ is Different

The longest-standing nationwide health data network supporting **diverse use cases**

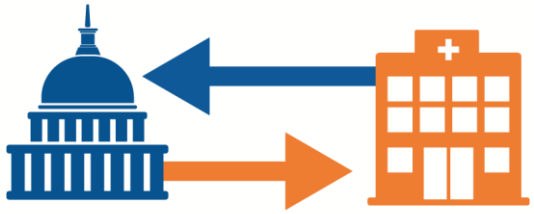
The principle network enabling Participants to connect directly with **federal agencies**

Access to Carequality implementer networks such as athenahealth, NextGen Healthcare, Surescripts, GE, & CommonWell

Incubated by the federal government, the non-profit with a public mission enables health information sharing between and among private and public partners.

Value Exchanging with Federal Agencies

An organization's participation in the eHealth Exchange allows them to:



- Support individual applications for **Social Security Administration** disability benefits and potentially recoup for uncompensated care
- Better coordinate care and effectively treat veterans who receive care at Veterans Health Administration and private providers
- Support care coordination and transitions of care for active duty military, retirees and their families who receive care via **Department of Defense's Military Health System** and private providers
- Submit quality measures for End State Renal Disease (ESRD) to **Center for Medicare and Medicaid**

The eHealth Exchange is the *only* health data network that allows a provider to exchange data with these 4 federal agencies.

Distinctive Data Sharing Model

Because the eHealth Exchange is a distributed network, data resides at the source and is only transmitted when needed.

This means that:

- There is no central hub or data repository where data is vulnerable
- There is respect for local policies and differing legal requirements
- You can use your HIE as your home network to connect to other HIEs, providers or government agencies

Real World Benefits to Patients and Providers

eHealth Exchange Benefits Patients

120 Million Patients Supported Nationwide!

- Patient records move easily between patient's medical providers. With permission, their latest records and prescriptions will be available online.
- Patients can move around the country and be able to provide doctors with their electronic medical records.
- Active Duty military and veterans and their families will be better supported.
- Patients can file for disability claims through organizations such as the Social Security Administration by making it possible for doctors to submit medical information electronically.

eHealth Exchange Benefits Providers

Doctors have ready access to patient records from multiple facilities.

Reduced administrative burden to contact other medical facilities for records

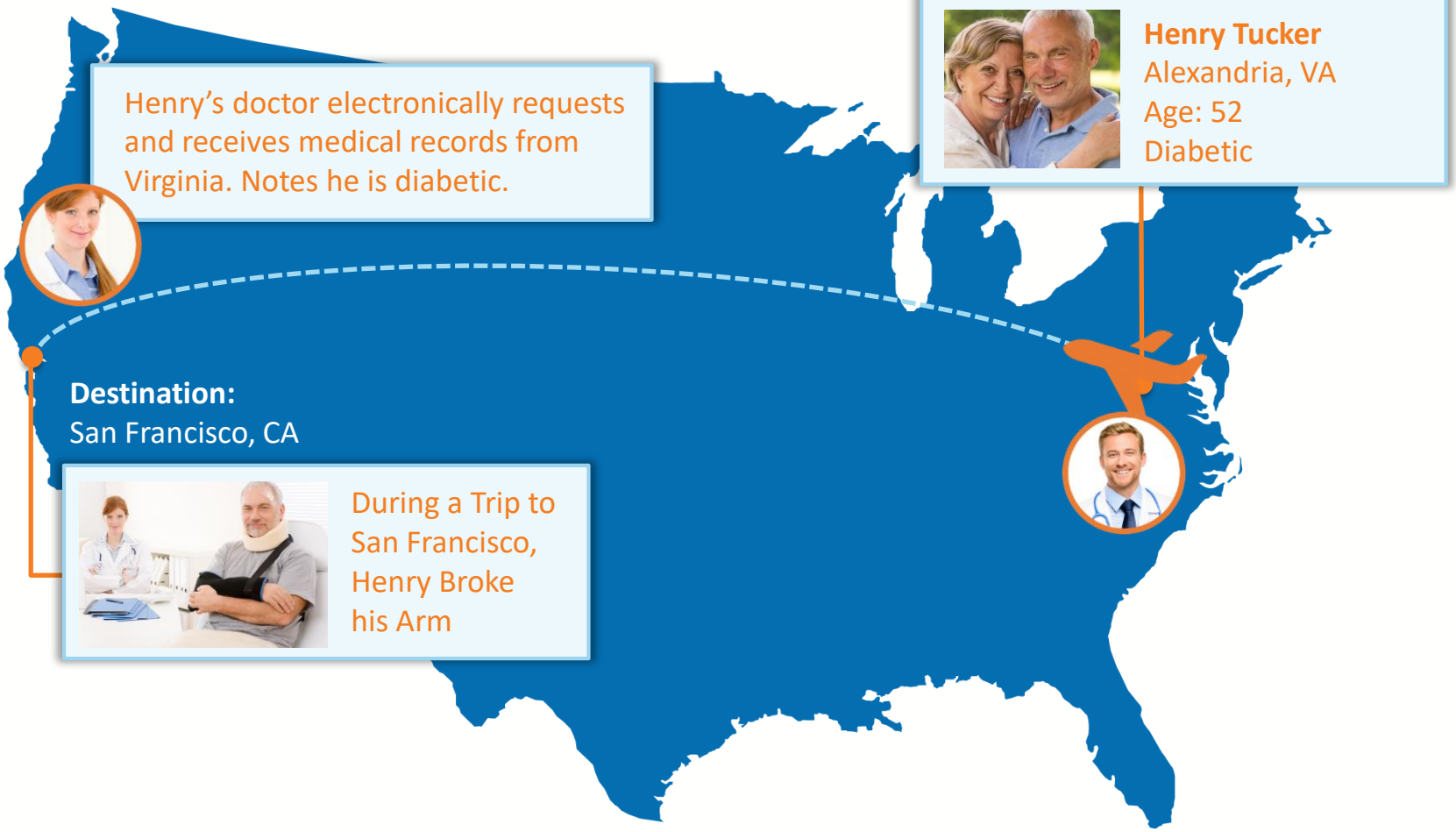
More comprehensive picture of patient's total health, aiding better diagnoses and treatment

More timely access to patient information for improved care coordination

Automates quality measures submissions to CME for quality measures incentives

Dramatically easier to exchange health records with federal agencies

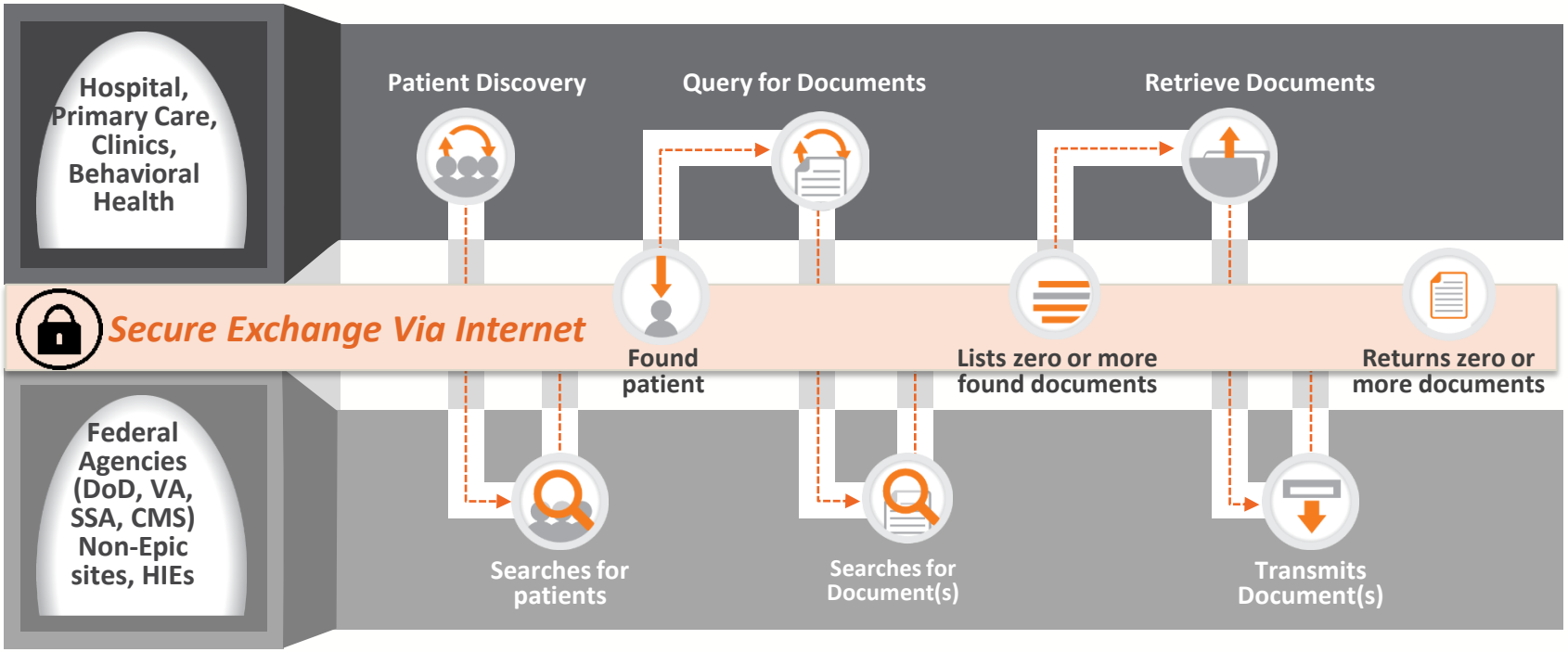
Benefitting Patients in Real Scenarios



Benefitting Patients in Real Scenarios

How eHealth Exchange Works

Overview of Query Workflow



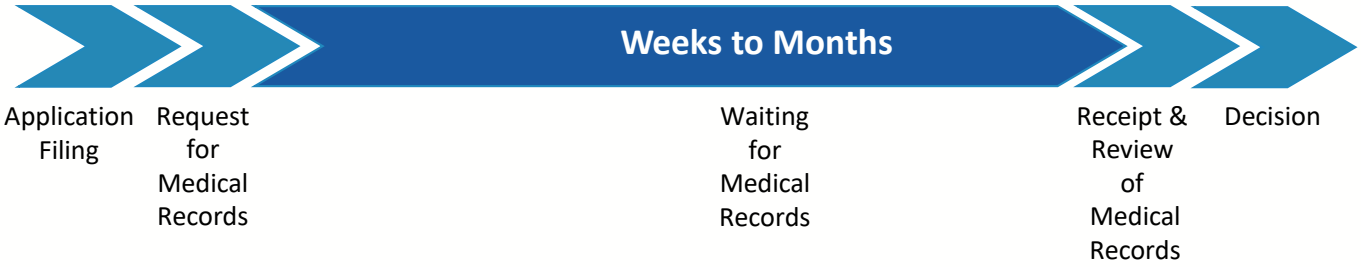
Broad Range of Patient-centric Use Cases

One Network: Many Use Cases

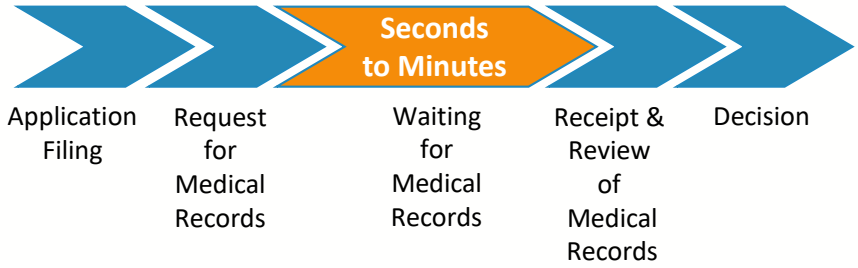
- **Treatment / Care Coordination**
- **Social Security Benefits Determination**
- **Immunization**
- **Authorized Release of Information – Consumer Access to Health Information**
- **Syndromic Surveillance**
- **Encounter Alerts**
- **Authorized Release of Information – Life Insurance**
- **Prescription Drug Monitoring Program (PDMP)**
- **Electronic Lab Reporting (in support of public health)**
- **Image Share Use Case**

SSA: A Closer Look

Manual Process (Mail, Fax, Scan)



Electronic Process (eHealth Exchange)



Benefits for Patients

- Faster disability claim determinations
- Quicker access to monthly cash benefits
- Earlier access to medical insurance coverage

Potential Benefits for Providers

- Electronic payment for medical information ($15 / transaction)
- Automated processing of the request for medical information and payment
- Operational Savings in the ROI process
- Potential to recover uncompensated care
  - Faster disability determinations provide patients with faster access to Medicare or Medicaid benefits

As of November, 2017, SSA is interoperating with 100 Exchange Participants and tens of thousands of sites.

Value Based Care: A Case Study

Intel Connected Care

- *Intel Corporation* created an incentivized health insurance/care management program, known as *"Connected Care,"* for its nearly 20K Portland area employees and family members
- Intel's on-campus clinic, known as "*Health For Life Clinic," is managed by Premise Health* and provides a wide-range of ambulatory services
- *Premise Health* uses a *Greenway Health EMR solution*
- "Connected Care" members receive primary care from either local *Kaiser Permanente or Providence Medical facilities (both use Epic EMR solutions)*

Want to Learn More?

A detailed whitepaper is available online.

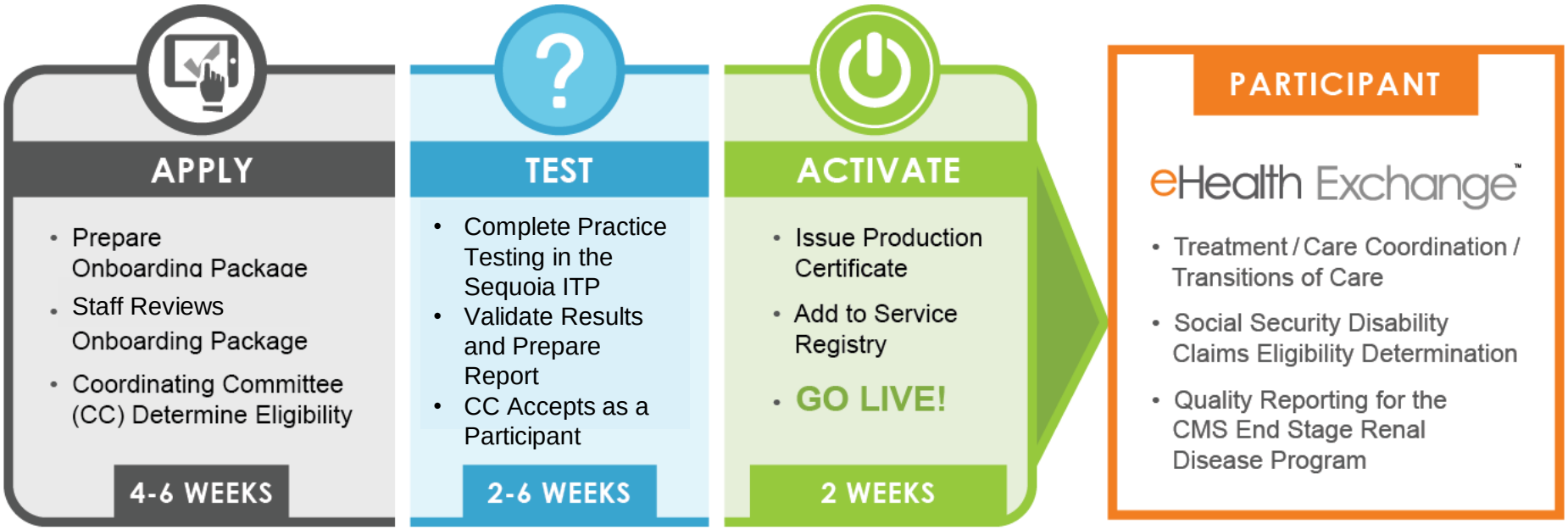
Intel's Connected Care Program

Value-based care model designed to improve overall health and wellness of Intel's employees by providing information exchange and real-time care analytics for optimal care

Onboarding to the eHealth Exchange

Three Step Process

Onboarding & Testing Process



Timelines are based on averages and may be extended depending on Applicant's internal constraints (e.g., legal review, configuration/setup of technical environments, configuration control processes, technical resource availability. The Sequoia Interoperability Testing Platform (ITP) is available to eHealth Exchange Applicants, Participants, and Vendors seeking eHealth Exchange Product Validation.

*NOTE: Applicants using a QTS vendor **ARE NOT** required to complete testing in the DIL environment*

Testing is the Backbone of Interoperability

eHealth Exchange Testing for Interoperability

Provides testing of: Products, Participants and Content

- Tests for interoperability compliance and HIE standards
- Ensures predictable and reliable exchange

Customers using validated products onboard to eHealth Exchange FASTER and CHEAPER

Validated products receive the eHealth Exchange Validated Products Seal.

eHealth Exchange Validated Products

Vendors Enabling Reduced Fees for their Clients

Browsersoft Connected Health OpenHRE	Cerner Clinical Exchange Platform	Cerner Cerner Resonance	FHA Federal Health Architecture Connect
Epic Care Everywhere	Greenway Health Greenway Exchange	ICA The Interoperability Experts CareAlign	CiOX Health Prism
InterSystems InterSystems Healthcare	LTS Health Exchange LTS HEX	Medicity A Healthagen Business Network	Optum Optum HIE
Orion Health Exchange Gateway	Verinovum Purpose Driven Platforms Exchange Gateway	zeomega Jiva HIE Connect	

Approved Use Cases and Corresponding Standards

Approved Use Cases and Corresponding Standards (1)

Use Case	Workflow	Standards / Specifications

Query / Retrieve Documents
• Supports multiple use cases including:
  ○ Treatment / care coordination
  ○ Transitions of care
  ○ Referrals
  ○ Social Security disability benefits determination
  ○ Life insurance determination
  ○ Individual access to health information, responder only
• Treatment includes the following sub-use cases:
  ○ Immunization – push of immunization data for treatment purposes (This is not related to reporting to immunization registries)
	Transmit clinical documentation to support treatment of an individual, care coordination or transitions of care
	
	Transmit clinical documentation to the Social Security Administration (SSA) for the purposes of supporting a claimant's eligibility for Social Security disability benefits
	
	Enables different types of networks (e.g. ROI companies, vendor intermediaries, etc.) to respond to transmit clinical documentation to another Participant. Participants supporting this profile may not initiate queries.
	
	Enables an individual using a PHR to request / receive a copy of his or her health information accompanied by a HIPAA-compliant authorization
		• Web Services Registry Web Service Interface Specification v 3.1
		• Messaging Platform v3.0
		• Patient Discovery v2.0
		• Query for Documents v3.0
		• Retrieve Documents v3.0
		• Authorization Framework v3.0
		• Deferred Patient Discovery
		• Immunization data requirements
		• HITSP C32
		• HL7® C-CDA Release 1.1 and Associated Companion Guide(s)
		• HL7® C-CDA Release 2.1 and Associated Companion Guide(s)
		• HL7® FHIR®
		• End Stage Renal Disease Implementation Guide Package [June 30]

• PDMP (treatment sub-use case)	• Enables exchange of Prescription Drug Monitoring Program Data	• NCPDP, PMIX, SCRIPT, and HL7®

Approved Use Cases and Corresponding Standards (2)

Use Case	Workflow	Standards / Specifications
• Submit Documentation to CMS • Currently, CMS accepts data for the End Stage Renal Disease Program (ESRD)	• Enables documentation and/or quality measure reporting to CMS	• Messaging Platform v3.0 • Authorization Framework v3.0 • Administrative Distribution • Document Submission • Required CMS content requirements (which varies by program)
• Authorized Release of Information – Individual Access to Health Information (e.g. via a Personal Health Record – PHR-DRAFT)	• Enables Clinical Exchange between Patient and Provider via a consumer application	• Web Services Registry Web Service Interface Specification v 3.1 • Messaging Platform v3.0 • Patient Discovery v2.0 • Query for Documents v3.0 • Retrieve Documents v3.0 • Authorization Framework v3.0 • Authorized Release of Information – Individual Access to Health Information (e.g. via a Personal Health Record – PHR-DRAFT)
• Encounter Alerts	• Enables event notification of clinical encounters to patient associated care team members	• VPN (transport)-DRAFT • HL7® v2 (content) • Direct Secure Transport v 2.1

Approved Use Cases and Corresponding Standards (3)

Use Case	Workflow	Standards / Specifications
• Electronic Lab Reporting (in support of public health)	• Enables electronic lab reporting to public health agencies	• HL7® Version 2.5.1 [ELR Implementation Guide]
• Syndromic Surveillance (in support of public health)	• Enables syndromic surveillance reporting to public health agencies	• HL7® Version 2.5.1 [Public Health Information Network (PHIN) Messaging Guide for Syndromic Surveillance: Emergency Department, Urgent Care, Inpatient and Ambulatory Care Settings]
• Image Sharing	• Enables organizations to share images	• Cross-Enterprise Document Sharing for Imaging (XDS-I) • Cross-Community Access for Imaging (XCA-I)

Thank You!

Website: http://www.ehealthexchange.com

E-mail: administrator@ehealthexchange.com