Lab Results Interface (LRI)
The Flexible Implementation Guide (IG)
Standards and Interoperability Framework Initiative (ONC)

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Change will not come if we wait for some other person, or if we wait for some other time.
We are the ones we’ve been waiting for. We are the change we seek.

~ Barack Obama
Overview

• The scope: Lab results to an EHR in an ambulatory setting
  • Has flexibility to support public health and acute settings
  • The initiative was tasked by S&I Framework with producing a single, comprehensive IG
• IG has flexibility through constraining message profiles
  • to support various requirements
  • able to be adjusted to support various levels of identification processes
Implementation Guide
Principles

- Highly scoped
- Focused on single care concern within domain
- Reduce the business level discussion
- Drive Interoperability between parties

- Broader scope
- Within a domain handle all possible care concerns
- Business level discussion necessary
- Drive Flexibility
How the LRI – IG Balanced

**HITSP HL7 IG**
- Standard: HL7 2.5.1
- Designed for broad set of use cases

**ELINCS HL7 IG**
- Standard: HL7 2.5.1
- Designed for narrow use case

**S&I Framework LRI IG**
- Standard: HL7 2.5.1
- Extensible base with required message profiles to enable constraints
- Constrained vocabularies
IG Approach with message profiles

Provides a path from slightly structured to very structured without rewriting the IG

Allows for multi use based on combination of message profiles used to support other requirements

**XO Profile**
- All optional fields changed to not used

**NB Profile**
- New born screen requirements

**ELR R2 Profile**
- Public Health Reporting

**NG Profile**
- Further Constrained

**RU Profile**

**LRI IG Basic Message Profile**

**GU Profile**

**RN Profile**

**LRI IG Basic Message Profile**

**Base Profile**
The Path to Consensus

- Consensus by broad and deep community of 90 active participants
- Support from proponents of ELINCS and HITSP IGs
- Key issues considered:
  - Based on a standard (HL7 2.5.1) with 200+ lab/EHR deployments
  - Reviewed by vendors for clarity and implementer-friendliness
  - Testable conformance parameters in conjunction with NIST
  - Adoption of standard terminologies (LOINC, SNOMED – Micro-Organism identification)
  - Continued updates through errata proposals
Key Recommendations

• LOINC® vocabulary is required as is applicable to the list of In-Scope Tests for the initial LRI Use Case
• SNOMED® is recommended as a vocabulary
  – Micro organism results only at this time
• Items to be piloted for future Meaningful Use Requirements:
  – UCUM® for units of measure
  – OIDs for globally unique identifiers
• Getting EHR and LIS vendors to agree that they can implement the IG and use it to transmit and consume lab results while minimizing customization and translation
• Developing resources and tools to providers that conform to the new LRI IG, facilitated by Meaningful Use, State HIEs, RECs, and broad product availability
Piloting the IG

• The pilot will determine whether the LRI IG, the vocabulary concepts, and the Lab Results are implementable
• The pilot will validate vocabularies to confirm that they are appropriate and relevant.
• A Validation Tool Suite has been provided to validate messaging standards
The LRI - IG

- The guide can be found at:
  - WWW.HL7.org – Standards – Implementation – Laboratory
To improve is to change; to be perfect is to change often.
~ Winston Churchill

Questions?