Basic Guide to Public Comment Review of IHE Profiles in FHIR® IG (Implementation Guide) Format

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Introduction

This “getting started” document is intended to help a reader who has read IHE Profiles but is unfamiliar with reviewing IHE profile requirements in FHIR Implementation Guide format. This is not a tutorial on FHIR®. Read HL7® FHIR’s overview of an Implementation Guide here.

Navigating the IG

The header section of an IHE FHIR IG contains a horizontal bar containing dropdown menus with quick links to help the reader navigate through the document. In general, the menu aligns with traditional sections in an IHE Profile (e.g., Volume 1, Volume 2, Volume 3).

- IMR Home - contains an introduction to the profile and a full table of contents
- Volume 1 - contains traditional IHE profile Vol 1 content - overview, actor/transaction/option requirements, and use cases
- Volume 2 - contains traditional IHE profile Vol 2 content - transaction requirements
- Test Plan - contains guidance on testing this profile. This section is typically not completed until the IG is published for Trial Implementation
- Artifacts - see next section

In addition, the right side of each page contains a mini-TOC with links to the section headers on that page, e.g.,:
The Artifacts Section

The content of the Artifacts page differs from a traditional IHE profile in that various technical/normative constraints are defined using FHIR conventions, e.g.,:

**StructureDefinitions**

StructureDefinitions are normative in an IHE profile. IHE constraints on FHIR Resources are expressed in StructureDefinitions. Constraints include changes to the default requirements for FHIR resource attributes, e.g., changes to cardinality, optionality, or a value set used to populate an attribute. In general, it is equivalent to a “content definition” contained in Volume 3 of an IHE profile.

The content of a Structure Definition is rendered in different views (formats) in a FHIR IG. A reader may choose a view based on her/his interest.

**Formal Views of Profile Content**

Description of Profiles, Differentials, Snapshots and how the different presentations work.

- Text Summary
- Differential and Snapshot views - explained here.
- All - contains all resource attributes, constrained or unconstrained

**Extension Definitions**

An extension is encoded as a StructureDefinition Resource and is normative. When a default data type definition in FHIR does not meet the needs of the IHE profile, an extension modifies/constrains a data type definition.

**Terminology / Value Sets**

ValueSets are normative. Defined as ValueSet Resources, these constrain values that are used to populate the attribute in a resource.

**Examples**

Examples are informative. Some readers may choose to review these examples rather than the formal resource definitions, as the examples are manifestations of the requirements in the StructureDefinitions.

**CapabilityStatements**

CapabilityStatements are informative. A CapabilityStatement documents specific capabilities that different types of systems are expected to have in order to comply with this implementation guide. Systems conforming
to an actor in the implementation guide are expected to declare conformance to one or more of the capability statements included in the IG.

**Submitting Public Comment**

The IG format offers challenges and opportunities during the Public Comment phase.

**Practical Considerations**

- **Line numbers** - unlike a traditional IHE profile, IGs do not have line numbers enabling the reviewer to identify the location in the document. **Alternatives:**
  - Sections can be identified in the traditional way, e.g., TF-2: 4.104.4.1.2
  - Each section & subsection in the IG has a link, e.g., https://profiles.ihe.net/ITI/PIXm/ITI-83.html#2383412-message-semantics

**Using the traditional public comment methods**

Use the ‘traditional’ public comment methods (google form or spreadsheet). See https://www.ihe.net/Radiology_Public_Comments/.

**Using GitHub pull requests**

For uber-savvy GitHub users, it is possible to create a branch that would contain your suggested edits to the IG, and a pull request associated with a branch or GitHub issue. If that sentence raises questions in your mind, you are not a candidate to create a pull request as part of public comment.

**Using GitHub issues**

Public comment for some IHE IGs will allow a commenter to submit GitHub issues. The public comment announcement will include details when a given public comment cycle allows use of GitHub issues.

GitHub issues contain a template with fields that follow traditional public comment format. Commenters create one issue for each comment to allow for easier resolution.

Here is an example GitHub issue with the IHE public comment template: https://github.com/IHE/ITI.PIXm/issues/74

Issues can be ‘tagged’ to help with committee processing:

- □ 2:3.104.4.2.3 - suggested improvement to expected actions on merge
  #76 by lynnfel was closed on Sep 29, 2021
- □ 2:3.104.4.1.3 - Patient Resource constraints
  #75 by lynnfel was closed on Oct 21, 2021
- □ 2:3.104.4 - clarify R/O on the messages in the feed transaction
  #74 by lynnfel was closed on Oct 21, 2021