## Mark Tucker Blog on Interoperability Layer

22-July-2013

This page represents my thinking on the Interoperability Layer / SHR nexus of ideas.

- "RAMRS SHR Testbed" Larry Lemmon and I are advocating the use of RAMRS (The Regenstrief Automated Medical Record System) as the SHR. Actually, our position is that we want to build an OpenHIE test bed that uses RAMRS as the SHR. The existence of two SHR's will keep the IOL honest. In particular, it will be a powerful proof-by-example that "mainline HL7 processing" within the OpenHIE need not involve the other Registries. (Ie, TS need not be consulted "in realtime", nor Patient Matching.) Secondly, it will be a safety net if OpenMRS runs into technical problems. We are both, however, highly interested in pushing OpenMRS forward to be a full scale EMR. And we are concerned that effort spent on RAMRS will deflect from the momentum behind OpenMRS.
- "No ESB" We (Larry and me) are not convinced that we need to use an ESB. My current thinking is that rather than talking about the Interoperability Layer as the glue surrounding all the registries, it is best to think of there being a Central Node. The Central Node exposes a set of interfaces to the EdgeNodes. The Central Node, then, would include the customary registries CR,FR,PR,TS, plus the SHR, plus, perhaps an ESB. The ESB would be used in use cases that are not in the mainline data flow.
- "Warehouse" The architecture diagram should have three more nodes.
  - o [W.DI] Warehouse, de-identified. This would be DHIS, and represents de-identified, more aggregate data extracted from the SHR.[
  - [W.PHI] A possibly identified data warehouse. This could be I2B2, or other research tools. The idea is to be able to talk about non-patient centric data, or perhaps, just a different data layout.
  - ° [CDS] Clinical Decision Support. Where does this functionality live?

23-July-2013

I added the document Primary Use Cases of OpenHIE to capture the story that drives me forward. It does not seem too controversial, except in so far as it is, perhaps, simpler than a design that uses XDS and ad-hoc queries. My hope is that people will respond.

The next big decision is to decide on the Stack of Standards, hopefully in favor of IHE!