<table>
<thead>
<tr>
<th>Agenda</th>
<th>Time</th>
</tr>
</thead>
</table>
| Welcome, Anti-Trust Reminder, and New Members Admitted  
Dave Lee, Leavitt Partners                  | 12:00pm – 12:05pm |
| Leadership Perspective  
Aneesh Chopra, Care Journey                  | 12:05pm – 12:15pm |
| Patient and Caregiver Perspective  
Dave deBronkart                                | 12:15pm – 12:20pm |
| CARIN Alliance – Accomplishments and Plans  
Ryan Howells, Leavitt Partners               | 12:20pm – 12:35pm |
| CARIN Blue Button® draft implementation guide  
Amol Vyas, Cambia  
Ryan Howells, Leavitt Partners               | 12:35pm – 1:25pm |
| Break                                       | 1:25pm – 1:35pm |
| CARIN Real-Time Pharmacy Benefit Check  
Pooja Babraik, Point of Care Partners  
Dave Lee, Leavitt Partners                    | 1:35pm – 2:15pm |
| CARIN Code of Conduct  
Ryan Howells, Leavitt Partners  
Dave Lee, Leavitt Partners                    | 2:15pm – 2:45pm |
| Public Policy Update on Consumer Privacy Initiatives | 2:45pm – 2:55pm |
| Next Steps                                  | 2:55pm – 3:00pm |
| Adjourn                                     | 3:00pm   |
General Membership Update – New and In Process CARIN memberships

Alphabet/Google Health/Verily
Anthem
BlueCross BlueShield of Arkansas
BlueCross BlueShield of Minnesota
Blue Shield of California
Cognizant
CVS Health
The Commons Project
Envision RX
HealthLX
Humetrix
IBM Watson Health
Intersystems
Merck
Premera Blue Cross
Prime Therapeutics
Prominence Health Plan
Samsung
Symptomatic
UPMC
Patient Perspective
DAVE DEBRONKART
CARIN Alliance – Accomplishments and Plans
RYAN HOWELLS
Get Involved!

1. **CARIN Blue Button 2.0 API**
   - HL7 Confluence page: [https://confluence.hl7.org/pages/viewpage.action?pageId=55941223](https://confluence.hl7.org/pages/viewpage.action?pageId=55941223)
   - HL7 Connectathon track: [https://confluence.hl7.org/display/FHIR/2019-09+CARIN+Blue+Button](https://confluence.hl7.org/display/FHIR/2019-09+CARIN+Blue+Button)
   - Meets Mondays at 2:30ET

2. **Trust Framework and Code of Conduct**
   - Meets third Friday of each month at 2:00

3. **Real-time Pharmacy Benefit Check API**
   - At the point of dispensing: Person-centric F&B info, OOP Cost, Therapeutic Alternatives, & Cash Price (GoodRx)
   - HL7 Confluence page: [https://confluence.hl7.org/display/CAR/RTPBC+Project](https://confluence.hl7.org/display/CAR/RTPBC+Project)
   - HL7 Connectathon track: [https://confluence.hl7.org/pages/viewpage.action?pageId=58654805](https://confluence.hl7.org/pages/viewpage.action?pageId=58654805)
   - Meets second and fourth Friday of each month at 3:00

4. **Post-Acute Care API (managed by MITRE)**
   - Various calls each Wednesday; contact LP or MITRE

5. **Digital Identity and Consent**
   - ID proofing and Authentication across providers and health plans, Trust & Federation, Consent, & Matching
   - Meets fourth Friday of each month at 2:00

6. **Policy**
   - Meets fourth Friday of each month at 2:00
Representative Attendee Organizations (30)


Major Questions

- How do we identify unique users across systems using person-centric mobile technologies?
- How do we securely authenticate individuals across systems using modern, open standards?
- Once a patient is identified at one organization, how do we cross-facility match a patient to their records?
- What does a consumer-directed, electronic federated consent approach look like?

There were 10 ‘toolbox’ presentations that addressed potential solutions to the five problems surfaced: (1) identity, (2) authentication, (3) trust & federation, (4) consent, and (5) matching. See companion document for copies of the presentations.

NEXT STEPS

Investigate a proof of concept, identify pilot partners, and explore funding opportunities
Release of the CARIN Blue Button® draft implementation guide announced @ White House

Volunteer participants in real-world testing

Sheryl Turney, **Anthem, Inc.**
Ricky Bloomfield, MD, **Apple**
Kristen Valdes, **b.well**
Jim Adamson, **BlueCross BlueShield of Arkansas**
Kari Hedges, **BlueCross BlueShield Association**
Somesh Nigam, **BlueCross BlueShield of Louisiana**
Dr. Patrick Conway and Robert Emerson, **BlueCross BlueShield of North Carolina**
Nick Coussoule and Heather Kennedy, **BlueCross BlueShield of Tennessee**
Jennifer DeAngelis and Karen Xie, **Blue Shield of California**
Laurent Rotival, **Cambia Health Solutions / Regence BlueCross BlueShield**
Amit Shah, **Florida Blue**
Aashima Gupta, Joe Corkery and Ilia Tulchinsky, **Google**
Heather Cox, **Humana**
Claudia Williams and David Kates, **Manifest MedEx**
Dr. Josh Mandel, **Microsoft**
Dr. Greg Robinson, **Marshfield Clinic Health System-Security Health Plan**
Upen Patel, **Prominence Health Plan**
Scott Haas, **UPMC Health Plan**
Jessie Tenenbaum and Corey Mercy, **State of North Carolina**
Cathie Ott, **State of Washington**
Important HL7® FHIR® Connectathon Information

1. Register for the September 14-15 Connectathon here
2. Please also register using this link for the Pre-Connectathon Survey and provide your track selection so that HL7 can connect you with your track lead and plan space accordingly
3. Onsite HL7® FHIR® Connectathon Planning Session for both CARIN implementation guides
   Saturday, September 14th from 9am – 10am in Room M104 and M105
4. Please familiarize yourself with the RTPBC track page here and Blue Button track page here which includes the documents and data for the Connectathon.
5. If you are attending the RTPBC track, please add your name to the RTPBC track participant sheet. If you are attending the Blue Button track, please add your name to the Blue Button track participant sheet
6. Onsite HL7® FHIR® Connectathon Debrief for both CARIN implementation guides
   Sunday, September 15th from 3pm – 5pm in Room M101
7. Zulip chat to coordinate efforts
   • #CARIN Blue Button and #CARIN Real-time Pharmacy Benefit Check IG
CARIN Blue Button® updates and common app registration process

1. **Source System to FHIR® mapping**
   - CARIN’s work with Cognizant / TriZetto

2. **Source System to X12™ to FHIR® mapping**
   - CARIN’s work with Cathy Sheppard, Executive Director of X12™

3. **Application Registration Process (sample approach)**
   - Register your application and company contact information
   - Register for the developer’s sandbox and providing the client secret
   - Publishing developer documentation (OAuth 2.0, Open ID connect, etc.)
   - Review application’s terms and conditions
   - Application attestation to the CARIN Code of Conduct
   - Application demo (optional)

4. **Centralized Application Registration Utility Playbook (Need to discuss)**
   - Common registration approach (public/private) that includes a common app review process
   - Many companies can help build the technology, but they would build it similarly
   - Fully delegated authority for the health plans to turn on/off application access

5. **Centralized, publicly available FHIR® API end point directory**

6. **Centralized list of third-party applications who has connected with providers/plans**
## A Roadmap for Advancing Consumer-directed Exchange

<table>
<thead>
<tr>
<th>WHAT WE HAVE THAT NEEDS TO SCALE</th>
<th>WHAT WE STILL NEED</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>POLICY</strong></td>
<td></td>
</tr>
<tr>
<td>CARIN Code of Conduct</td>
<td>Expanded MPN questionnaire</td>
</tr>
<tr>
<td></td>
<td>Independent Application Certifiers</td>
</tr>
<tr>
<td><strong>CONTENT</strong></td>
<td></td>
</tr>
<tr>
<td>Consensus-based FHIR IGs and Rigorous Testing (CARIN, DaVinci, Argonaut, Gravity, MCode, PACIO)</td>
<td>Analysis between HL7® FHIR® Accelerator projects &amp; total available consumer-data elements</td>
</tr>
<tr>
<td>Consensus-approaches to common problems</td>
<td></td>
</tr>
<tr>
<td><strong>TRUST</strong></td>
<td></td>
</tr>
<tr>
<td>NIST 800-63-3 – Digital Identity Credentials</td>
<td>Agreed upon ID federation principles across sectors</td>
</tr>
<tr>
<td>Open Standards (OpenID Connect, OAuth 2.0, FIDO2)</td>
<td></td>
</tr>
<tr>
<td>Certification of Identity Providers</td>
<td>Agreed upon RLS principles across sectors</td>
</tr>
<tr>
<td><strong>REGISTRATION</strong></td>
<td></td>
</tr>
<tr>
<td>Centralized registration that enables the application to access all of the HL7®FHIR® client end points</td>
<td>Common Registration utility for all plans</td>
</tr>
<tr>
<td></td>
<td>Centralized list of HL7® FHIR® API end points</td>
</tr>
<tr>
<td></td>
<td>Common way to inventory consumer apps</td>
</tr>
<tr>
<td><strong>METRICS</strong></td>
<td></td>
</tr>
<tr>
<td>Total # of Available compliant HL7® FHIR® end points</td>
<td>Tracking these measures over time</td>
</tr>
<tr>
<td>Total # of Available connected applications</td>
<td></td>
</tr>
</tbody>
</table>
CARIN Blue Button® draft implementation guide
AMOL VYAS AND RYAN HOWELLS
RTPBC Background
Challenges with accuracy of current Formulary & Benefit data led to a search for a better solution:

- Formulary data is based on “Plan-” or “Group”-level; not patient specific
- Prior Authorization flag often missing or inaccurate
- Formulary tier/preferred level often not accurately displayed for HCP
- Issue is payer providing the data, not the standard

**Eligibility Request**
- First Name
- Last Name
- Gender

**Eligibility Response**
- Formulary List ID
- Coverage List ID
- Co-pay List ID
- Alternatives List ID

**Intermediary**
- Formulary & Benefit Data Plan Membership

**PBM/Processor**
Real-time Pharmacy Benefit Check: B2B Overview

Prescription covered by benefit:
- Patient financial responsibility

Prescription not covered by benefits:
- Reason for Denial
- Alternatives
- Coverage Limits
- PA required
- Step therapy
- Drug Utilization Review (DUR) alert
Consumer-facing Real-time Pharmacy Benefit Check

Policy drivers

• *Patients Right to Know Drug Prices Act* – December 2019
• Real-time Benefit Tool Final Rule
• CMS NPRM (Formulary and Benefit information)

Approach

• Co-branded Implementation Guide (Co-branded between NCPDP and HL7)
• HL7 FHIR-based API for third-party application access to include: Formulary and benefit information, OOP cost information, Therapeutic alternatives, Cash/Discount price alternatives (e.g., GoodRx)
  • HL7 Connectathon Sept. 14 – 15 to finalize FHIR transaction approach
• NCPDP standard in process for B2B transaction; Project Development Form for consumer-facing use case to be presented at November Workgroup Meeting
  • Beta transaction for B2B approved at August Workgroup; Balloting timeframe (Sept. 13 – Oct. 28)
Work Completed to Date

- Reviewed **nine** potential use-cases currently in production
- Discussed lessons learned from B2B implementations
- Finalized **two** use cases for initial Implementation Guide
- Confirmed **SMART App Launch Framework** for authentication
  - Regulations require covered entity to ensure an individual (not a service) is the one making the request for their information via the individual right of access request
- Agreement to develop **one API** for both the PBM/Payer and Cash/Discount vendor requests
- Finalized initial mandatory and optional fields for request and response
- Developed two sample transactions to test head to head at Sept. Connectathon
- Finalized timeline for initial IG release
Overview: Consumer has been prescribed a medication and is looking up the prescription price and/or formulary/benefit information and potentially a location to dispense their prescription on a stand-alone app. Two initial use cases:

1. Lowering patient out-of-pocket cost for initial prescription fill
2. Pricing alternatives for an existing prescription

Objectives:

• Consumer wants to understand their Rx out of pocket cost, which includes deductible, donut hole, etc.
  • Include verbiage that says the OOP costs are based on an estimation based on a point in time
• Consumer wants to understand their formulary and benefit information (There will be a covered or not covered indicator sent to the member; there is also an explanation as to why it’s not covered)
• Consumer wants to understand who their prescribing provider is
• Consumer wants to determine their price alternatives, which includes their cash price (GoodRx)
• Simplify or eliminate the prior authorization process
• Determine the therapeutic alternatives that are covered
• Determine any step therapy that may be required
Workflow

• Consumer chooses app which has the ability to access the consumer-facing RTPBC
  • Application manages the medication list (FHIR etc.) or allows for medication look up feature
• Consumer enters the name of the drug and the application displays the Formulary and Benefit information and out of pocket cost information
  • App will send the prescription information (representative NDC, actual NDC or RxNorm)
• PBM will return the appropriate information (the application will choose from the following)
  • Current RTPBC data based on objective
• Cash pricing app will return cash pricing information per pharmacy based on the functionality within the end user’s application
  • NDC/NCPDP information
  • Zip Code
Patient-Facing Real-Time Pharmacy Benefit Check Overview

** USER / INDIVIDUAL **

APPLICATION LAYER
Patient/Caregiver can access information through any* consumer app

** AUTHENTICATION LAYER **

SMART on FHIR (bypass for Cash Price/Discount Price Data)

DATA SOURCES

RTPBC data is sent back to the patient’s chosen app(s)

PBM/Payer

Cash/Discount Price Vendor

Send Zip & NDC/NCPDP info. (SMART/Authn. NOT needed to access the data)

Cash Price returned to patient’s app(s) & Payer

*Patient Authentication (SMART/Authn. needed to access the data)
Next Steps

• Gather feedback from PBM/Payers, Cash/Discount Vendors and mobile app developers on two FHIR API approaches at upcoming Connectathon
  • Connectathon: Sept 14 – 15

• Finalize approach and develop Implementation Guide

• Shepherd Implementation Guide through the HL7 Ballot Process
  • Expected approval of Draft Standard for Trial Use (DSTU) – February 2020

• Submit Project Development Form for consumer-facing use case at NCPDP
  • Expected approval for use case – November 2019

• Continue to develop additional use cases and address parking lot items
Key Principles in the Code of Conduct

I. Informed Choice
   • Well informed consumers who make an intentional decision is the best way for consumers to direct their health information

II. Application Attestation
   • Applications should attest to and be held accountable for a set of structured, consistent, and reportable responses regarding how they plan on using consumer’s data

III. Purpose Specification
   • Consumers should have the ability to specify the purposes in which their data can be used by an application
Recent Updates and Needed Additions

- Additional clarity on scope of the code
- Harmonization of terms
- Need additional clarification on some definitions
- Need additional work on the questionnaire
  - https://docs.google.com/document/d/1_dqqYcsVHY3Ab2Y40qfrnDtaypW2brbjLcLfmDLUUmZU/edit?usp=sharing
- Need to simplify the questionnaire and make it more visual to the consumer similar to a ‘nutrition label’

Implementation Partners (sampling)

- VHA
- Carequality
- CMS
- EHRs / Health Plans
- Consumer Platforms
Public Policy Update on Consumer Privacy Initiatives
Policy Workgroup: Privacy

• Meetings with sponsors of new consumer-facing privacy legislation

• Meetings with Committees of Jurisdiction on privacy policy options

• Meetings with OCR and ONC and operationalization of HIPAA Individual Right of Access and consumer

• We continue to work to find time with a smaller group to discuss how and if we engage in broader privacy activity, 42 CFR Part 2 reform or other privacy activities
Next Steps