Data Segmentation and Classification for Link4Health Stage 1

Version 1, August 2016

Purpose

This paper describes how the Washington State Health Care Authority (HCA) determined which data to include in the Link4Health Clinical Data Repository (CDR) during the first stage of product implementation. It will provide background on the Link4Health product, a description of the access and control method, and information regarding the process used to develop segmentation and classification rules. A companion document, Classification Code Sets (Code Set) is available which contains procedure, diagnosis, and other code sets used for the segmentation and classification by HCA.

Please note that nothing in this document is intended to replace legal advice regarding the application of state or federal privacy laws to medical information. The HCA recommends that each provider participating in Link4Health carefully review their own data classification and sharing policies and make informed determinations on what data is submitted or withheld.

Background

HCA is responsible for the purchasing and managing of health care for more than 2 million Washingtonians, under the Apple Health (Medicaid) and the Public Employees Benefits Board (PEBB) programs. The mission of the HCA is to “Provide high quality health care through innovative health policies and purchasing strategies.”

To help carry this mission, the HCA launched the Link4Health project as a multi-year initiative to advance the statewide electronic exchange of clinical records, and improve coordination of care between providers. Link4Health serves as a key part of the HCA’s long-term efforts to improve health care quality, better manage costs, and improve health outcomes. Link4Health serves as a clinical data extension of the enterprise Medicaid Management Information System (MMIS) in use by HCA.

1 For more information on Link4Health, see http://www.hca.wa.gov/healthit/Pages/index.aspx
2 http://www.hca.wa.gov/Pages/about.aspx
Link4Health will be implemented in multiple stages, to support three key goals:

1. Meet providers where they are in terms of technology capabilities
2. Invest in services and features as they become useful to the provider and patient community
3. Ensure access and control policies are in place which support appropriate sharing, confidentiality, and consent management

Confidentiality for Data Sharing

The Centers for Medicare and Medicaid Services (CMS) heavily invested into health information technology by creating financial incentives for providers to adopt, implement, upgrade, and meaningfully use electronic health record (EHR) systems. This investment laid the foundation for electronic clinical data exchange and the technology infrastructure that supports the CDR. The 2014 criteria for meaningful use defined by CMS requires a provider’s EHR to have the ability to electronically transmit a patient’s summary of care record to another provider. These care summaries must be transmitted using standard Consolidated Clinical Data Architecture (C-CDA) transactions.

As part of the C-CDA standard, care summary documents must include a confidentiality flag which addresses the potential sensitivity of the information contained within the document. The confidentiality codes, descriptions and definitions are presented in the table below.

<table>
<thead>
<tr>
<th>Confidentiality Code</th>
<th>Description</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>N</td>
<td>Normal</td>
<td>Privacy metadata indicating that the information is typical, non-stigmatizing health information, which presents typical risk of harm if disclosed without authorization.</td>
</tr>
</tbody>
</table>

3 For more information on Meaningful Use criteria, see [https://www.healthit.gov/providers-professionals/meaningful-use-definition-objectives](https://www.healthit.gov/providers-professionals/meaningful-use-definition-objectives)

4 45 Code of Federal Regulations (CFR) 170.306(f)(2)

5 45 CFR 170.205(a)
Includes what HIPAA identifies as the minimum necessary protected health information (PHI) given a covered purpose of use (treatment, payment, or operations). Includes typical, non-stigmatizing health information disclosed in an application for health, workers compensation, disability, or life insurance.

**R**  Restricted

Privacy metadata indicating highly sensitive, potentially stigmatizing information, which presents a high risk to the information subject if disclosed without authorization. May be preempted by jurisdictional law, e.g., for public health reporting or emergency treatment.

Includes information that is additionally protected such as sensitive conditions mental health, HIV, substance abuse, domestic violence, child abuse, genetic disease, and reproductive health; or sensitive demographic information such as a patient's standing as an employee or a celebrity. May be used to indicate proprietary or classified information that is not related to an individual, secret ingredient in a therapeutic substance, or the name of a manufacturer.

**V**  Very restricted

Privacy metadata indicating that the information is extremely sensitive and likely stigmatizing health information that presents a very high risk if disclosed without authorization. This information must be kept in the highest confidence.

Includes information about a victim of abuse, patient requested information sensitivity, and taboo subjects relating to health status that must be discussed with the patient by an attending provider before sharing with the patient. May also include information held under legal lock or attorney-client privilege.

Codes, descriptions, and definitions referenced from the HL7 specification[^6]. It is important to note that other confidentiality codes are available, but the HCA does not consider other confidentiality codes adequate for the protected health information which will be sent to the CDR.

Description of the Access and Control Method

There are five access roles established within Link4Health for the first stage, and the access roles correspond directly to the HL7 confidentiality codes listed above.

<table>
<thead>
<tr>
<th>CDR Access Role</th>
<th>Access Description</th>
<th>Example User Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>No Role Assigned</td>
<td>No access to the clinical data repository</td>
<td>Quality Assurance Staff</td>
</tr>
<tr>
<td>Test Role Only</td>
<td>Access to data within test environment only</td>
<td>Technical Staff, Clinical Reviewers</td>
</tr>
<tr>
<td>Normal Access</td>
<td>Access to content classified as Normal through the Clinical Portal</td>
<td>Case Manager, Care Coordinator</td>
</tr>
<tr>
<td>Restricted Access</td>
<td>Access to content classified as Normal or Restricted through the Clinical Portal</td>
<td>Nurse, Medical Assistant</td>
</tr>
<tr>
<td>Very Restricted Access</td>
<td>Access to content classified as Normal, Restricted, or Very Restricted through the Clinical Portal</td>
<td>Doctor, ARNP, Physician’s Assistant, Behavioral Health Specialist, Pharmacist</td>
</tr>
</tbody>
</table>

It is important to note that organizations contracted with the OneHealthPort Health Information Exchange will manage their own access levels to the CDR through the use of OneHealthPort Single Sign-On (SSO) Subscriber accounts. 7.

As Link4Health is expanded to support additional services and additional categories of patients, HCA will examine the access and control policies

Privacy and Classification Workgroups

Two interdisciplinary, multi-agency workgroups were formed between HCA, the Department of Social and Health Services (DSHS), and the Department of Health (DOH). The first workgroup, was focused on the legal aspects of privacy and data sharing for the CDR. The second workgroup, a data classification workgroup, used input from the privacy workgroup to review claims and encounter data and determine the appropriate data to submit to Link4Health. The data classification workgroup included staff with technical, legal, and clinical backgrounds to discuss potential classifications and data exclusions. This paper represents the results from the data classification workgroup.

7 For more information on OneHealthPort’s services, see http://www.onehealthport.com/hie
HCA recommends that each provider participating in Link4Health carefully review their own data classification and sharing policies and make informed determinations on what data is submitted or withheld. HCA is providing this paper as a resource for providers who, like HCA, are making the determinations of what data to share or withhold for the first time.

Data to be excluded from the first stage of Link4Health

The workgroup determined four primary categories of sensitive data to be withheld from the historical claims data load HCA is supplying to Link4Health. The following section describes these categories of data, and the criteria used to exclude the data from the claims and encounter loads into Link4Health.

1. Mental Health Programs and Providers

Services provided as part of a Mental Health program, or services provided by a Mental Health provider call for additional considerations on access control and consent management. HCA considered the following criteria to withhold data submitted to Link4Health during stage 1:

a. Services provided by or paid for by the DSHS Behavioral Health Administration (BHA).

   BHA provides and pays for mental health services for Apple Health clients, as well as some other Washingtonians. These services are typically provided or paid for under a contract between BHA and a Behavioral Health Organization (BHO).

b. Services billed to the HCA which were identified by the provider to be Behavioral Health related based on the submitted taxonomy code.

   The Code Sets document lists the taxonomies HCA considers to be mental health related, and the agency will not submit during the first stage.

c. Inpatient hospital services which have a Diagnosis Related Group (DRG) representing an inpatient psychiatric admission.

   For the purposes of Link4Health stage 1, the HCA is considering all services which group to a psychiatric DRG to be performed by a psychiatric provider. While not all inpatient psychiatric services are performed within the scope of a mental health program, that distinction is not contained within the agency’s claims and encounter data. Therefore, all inpatient psychiatric services are being withheld until a later project stage.

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8 Revised Code of Washington (RCW) 70.02.230
HCA groups inpatient services using the 3M APR DRG software\textsuperscript{10} for admission dates on or after July 1\textsuperscript{st}, 2014. HCA uses a list of DRGs from both the APR DRG software and AP DRG software in effect prior to July 1\textsuperscript{st}, 2014 to withhold inpatient services.

2. Substance Use Disorder (SUD) Programs

Services related to SUD also call for additional access control and consent management\textsuperscript{11}, and will be withheld from the data submitted to Link4Health during stage 1.

a. Services provided by or paid for by BHA

In addition to mental health services, BHA is responsible for the payment of most Substance Use Disorder services paid for Apple Health clients, as well as other groups of Washingtonians.

b. Services billed to the HCA which were identified by the provider to be SUD related based on the submitted taxonomy code.

The Code Sets document lists the taxonomies HCA considers to be SUD related, and the agency will not submit during the first stage.

c. Inpatient hospital services which have a DRG representing an inpatient withdrawal management admission

Similar to behavioral health services, the HCA is considering all services which group to an inpatient detoxification DRG to have been performed as part a SUD program. All inpatient detoxification DRGs, under both the APR DRG and AP DRG system, will be withheld until a later project stage.

3. Services related to a Sexually Transmitted Infection (STI)

Services related to STI procedures and diagnoses also call for additional access and consent management\textsuperscript{12}, and will be withheld from the data submitted to Link4Health during the first stage. STI services will be identified using diagnosis and procedure codes listed on the Code Sets document.

4. Services provided to a client on the Address Confidentiality Program

\textsuperscript{10} http://solutions.3m.com/wps/portal/3M/en_US/Health-Information-Systems/HIS/Products-and-Services/Products-List-A-Z/APR-DRG-Software/
\textsuperscript{11} 42 CFR Part 2
\textsuperscript{12} RCW 70.02.220
The Address Confidentiality Program (ACP) was developed to assist victims of certain crimes in keeping their current address confidential. While data can be submitted to the CDR in a way that maintains the confidentiality of the patient’s address, there is an underlying risk that the ACP client’s address could be generally deduced by the information contained within the CDR. Therefore, data relating to ACP clients is being withheld.

Data to be classified and included in the first stage of Link4Health

For services which are not excluded per the above categories, the classification workgroup identified diagnosis and procedure codes which should be classified as restricted or very restricted. HCA will be assigning these classifications to historical claims data supplied to Link4Health, and encourages provider organizations to work with their EHR vendors to set up capabilities in their systems to assign these classifications for submitted C-CDA documents on or before September 1, 2017. These classifications fall into four major categories, listed below:

1. Services related to SUD
   
   Many services performed as part of general medical care also contain SUD related diagnoses or procedures. For these services, the workgroup also decided on a classification of ‘Restricted.’

2. Genetic Screening
   
   Tests and diagnoses related to screening for genetic diseases were also identified as requiring additional confidentiality to prevent discrimination. For these services, the workgroup decided on a classification of ‘Restricted.’

3. Counseling for Abuse
   
   For diagnoses related to the counseling of victims of abuse, the workgroup decided on a classification of ‘Very restricted.’

All other services which do not fall in the above categories were determined by the workgroup to fall under the Normal classification.

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13 For more information on the ACP, see [http://www.sos.wa.gov/acp/](http://www.sos.wa.gov/acp/)
14 Genetic Information Nondiscrimination Act of 2008