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**PCEHR Implementation Guide**

Version 1.3 – 20 June 2013

Approved for external use

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## Version History

<b>Date</b>	<b>Version</b>	<b>Comments / Type of review</b>
25 September 2012	1.2	Approved for first publication.
20 June 2013	1.3	Updated with new getView web service functionality to be available in PCEHR Release 3. The following view messages are included: Prescription and Dispense View, Medicare Overview, Achievement Diary View, Observation View.

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# Preface

## Purpose

This document provides guidance to software developers on how to use the PCEHR B2B interface, produce well-formed B2B request messages, and receive and use responses from the system.

## Audience

This document is intended primarily for the following roles:

- software developers
- system analysts
- product managers.

These roles, in the context of this document, belong to organisations such as:

- healthcare provider organisations with in-house software development capabilities
- third-party system and service providers
- third-party healthcare software vendors.

The document assumes that readers are familiar with:

- PCEHR Concept of Operations [[ConOps](#)]
- Programming and its concepts
  - XML and XML-based standards, such as [[SOAP 1.2](#)]
  - Web Services and the Web Services Definition Language (WSDL).

## Scope

The following items are in scope:

- a brief high-level introduction to the PCEHR System and the eHealth environment, including Health Identifiers
- references to relevant protocols and technical service specifications
- reference to aspects of the technical services specifications
- sample XML messages (both requests and responses) for each B2B operation, as well as coding tips
- conformance points will be quoted only when necessary.

The following items are out of scope:

- user interfaces
- reference to the behaviour of integrated systems
- the architecture and security model of the PCEHR System
- A detailed discussion of CDA document structure.

## Related Documents

The document is part of a suite of documents made available to software developers. Its relationship to these other documents is shown in Figure 1 below.

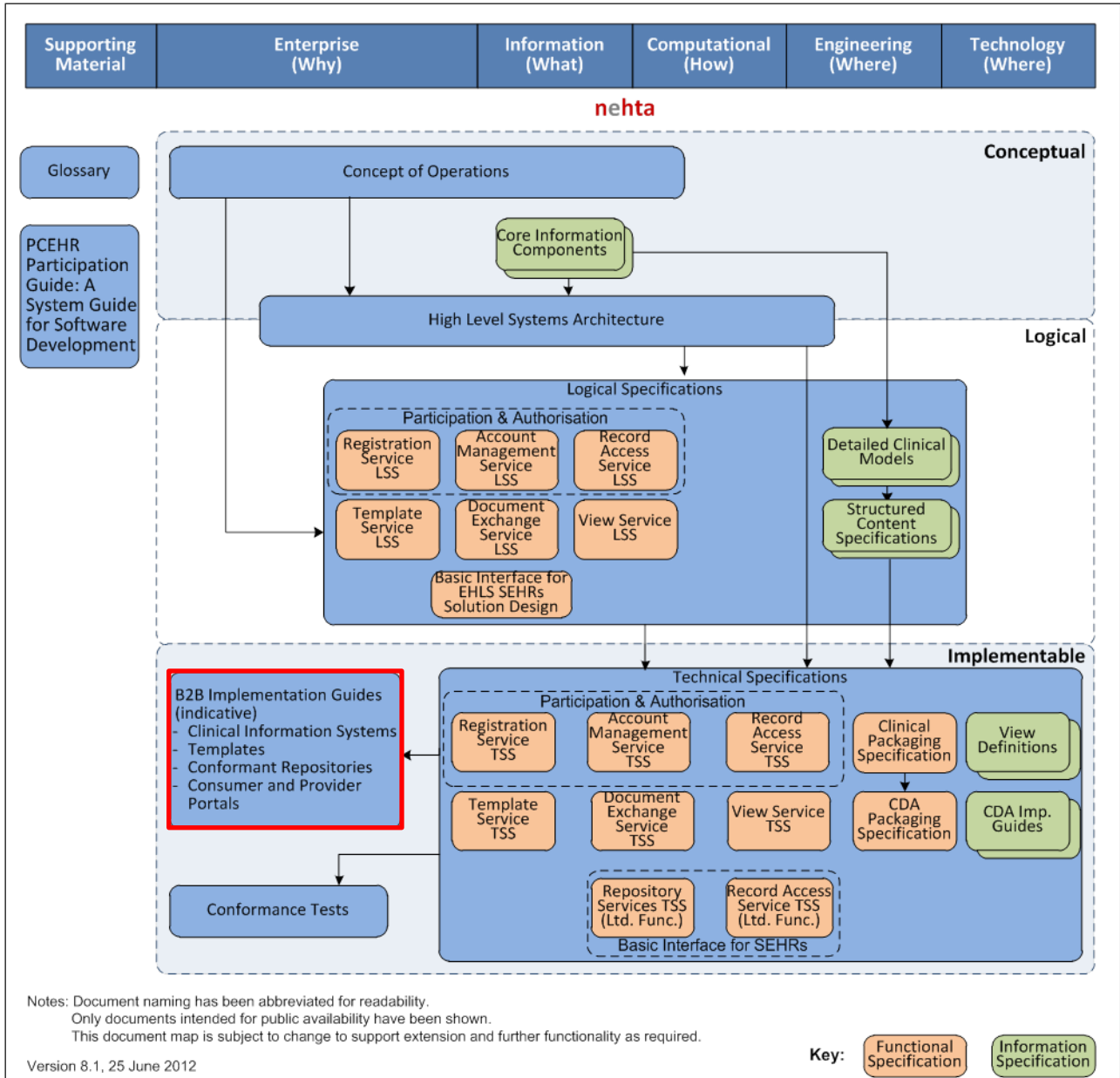


Figure 1: Document map of Software Developer Documents

The document refers to the following resources:

- The PCEHR Welcome Pack and the Conformance, Compliance and Accreditation (CCA) Welcome Pack. These are both sent to software developer organisations on request. Please contact the NEHTA Help Centre (formerly known as the NEHTA Service Desk): <http://www.nehta.gov.au/help-centre>
- The PCEHR logical and technical services specifications (LSS and TSS) available on the Vendor Portal [<https://vendors.nehta.gov.au>] under *PCEHR Core System* tab, *PCEHR B2B Gateway*.
- The CDA specifications for the relevant documents available on the Vendor Portal [<https://vendors.nehta.gov.au>] under *Clinical Documents* tab, *Common Specifications*.

Additional references are given in [Appendix H](#).



## Acronyms and Terminology

This document avoids unfamiliar acronyms and specialised terms as much as possible. However, where their use is unavoidable, the terms are explained in [Appendix G](#).

## Code Notation Conventions

Code is indicated by Courier font text in enclosed boxes:

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
```

The sample XML and MTOM messages given in the document are meant to be human-readable. The binaries and Base 64 packages have been considerably shortened or omitted altogether.

Deleted parts are indicated with a series of dots:

```
<h:signature xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
    .....
</h:signature>
```

Code is coloured according to the syntax scheme in Table 1.

Table 1: XML message colour coding

xml Type	Colour
Open tag without referenced namespace	<Classification
Open tag with referenced namespace	<s:Envelope
Close tag, with or without referenced namespace	</h:signature>
Attribute	xmlns=
Attribute with referenced namespace	xmlns:h=
String	"application/zip"
URL	http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0
Special entities	&amp;

# 1 Introduction

## 1.1 The PCEHR Concept

eHealth is important to the future of healthcare in Australia. For consumers and healthcare providers alike, it will enhance the way healthcare is delivered.

The Personally Controlled Electronic Health Record (PCEHR) System is the next step in using eHealth to enhance the healthcare system. The PCEHR System enables the secure sharing of health information between a consumer's healthcare providers and the consumer, while enabling the consumer to control who can access their PCEHR.

## 1.2 The Purpose of the PCEHR System

The PCEHR System will provide the necessary national infrastructure and standards-based specifications to enable secure access to a consumer's health information drawn from multiple sources.

Suppliers of eHealth systems will be provided with PCEHR design and technical specifications to help organisations enhance their products and services to become conformant with the relevant standards and specifications necessary for interaction with the PCEHR System.

## 1.3 Components of the PCEHR System

The National PCEHR System is distributed across a number of components. In Release 3, these components are:

- PCEHR Core System including the National Repository
- Consumer Portal
- Provider Portal
- B2B Gateway

Other systems in the PCEHR eHealth eco-system.

- DHS Medicare as Registered Repository
- PCEHR-compliant digital credential authentication service
- Healthcare Identifiers Service (HI Service)
- Template Service

## 1.4 B2B Interface

The B2B interface provides a secure and authenticated means to access the PCEHR System for a participant's system.

## 1.5 Service Mapping

Table 2 shows the mapping of the logical service and operation to the technical implementation.

*Table 2: Mapping of logical service and operation to technical operation*

<b>Logical Service</b>	<b>LSS Operation</b>	<b>TSS Operation</b>
DocumentExchangeService	DocumentSubmission.submitDocument	ITI-41 Provide and Register Document Set - b
DocumentExchangeService	DocumentRetrieval.retrieveDocument	ITI-43 Retrieve Document Set
DocumentExchangeService	DocumentRetrieval.findDocuments	ITI-18 Registry Stored Query
DocumentExchangeService	ConformantRepositoryRetrieval.retrieveRemoteDocument	ITI-43 Retrieve Document Set
DocumentExchangeService	DocumentRegistration.registerDocument	ITI-42 Register Document Set - b
DocumentExchangeService	DocumentRegistration.deregisterDocument	Bespoke Web Service - removeDocument
DocumentExchangeService	DocumentManagement.setDocumentAccessLevel	Bespoke Web Service - setDocumentAccessLevel
DocumentExchangeService	DocumentManagement.removeDocument	Bespoke Web Service - removeDocument
RecordAccessService	doesPCEHRExist	doesPCEHRExist
RecordAccessService	searchPCEHR	gainPCEHRAccess
RecordAccessService	gainAccessToPCEHR	gainPCEHRAccess
ViewService	getView	getView
ViewService	getChangeHistoryView	getChangeHistoryView
ViewService	getAuditView	getAuditView
ViewService	getDocumentList	registryStoredQuery (ITI-18)
ViewService	getRepresentativeList	getRepresentativeList
ViewService	getIndividualDetailsView	getIndividualDetailsView
TemplateRetrievalService	searchTemplate	<i>searchTemplate</i>
TemplateRetrievalService	retrieveTemplate	<i>getTemplate</i>
RegistrationService	register	registerPCEHR
RegistrationService	deactivate	
RegistrationService	reactivate	
RegistrationService	linkToPCEHR	

## 1.6 Connecting a Product to the National PCEHR System

To connect to the National PCEHR System, a product must pass test cases in order to be issued a Notice of Connection (NOC). The product will then be tested against a mandated number of conformance requirements in order to be registered for Conformance, Compliance and Accreditation (CCA). Following successful NOC and CCA, the software is then authorised to connect to the PCEHR System.

The complete product connection process is as follows:

1. Software developer conducts NOC tests with PCEHR System Operator.
2. PCEHR System Operator sends NOC declaration to DoHA.
3. Software developer conducts CCA tests with NEHTA.
4. NEHTA sends CCA declaration to DoHA.
5. DoHA sends production access letter to software vendor and PCEHR System Operator.
6. PCEHR System Operator grants the software developer access to the National PCEHR System.

## 2 Implementer Responsibilities and Prerequisites

### 2.1 Integration of a Third-Party Product with the PCEHR System

This document does not address the design of an integrated product; rather it is concerned with the interaction and behaviours between the software product interface and the PCEHR System at the B2B Gateway. These behaviours and interactions are built using the services described in the logical service specifications (LSSs) and the technical service specifications (TSSs) and are measured by adherence to the conformance points in these specifications.

Access to the PCEHR System is via the B2B Gateway, with requests made by the product and responses sent from the PCEHR System.

As part of PCEHR integration, you will need to be able to manage healthcare identifiers and certificates (including the ability for automated and manual periodic requests and validation of these):

- Healthcare Identifiers  
See section 3.1. These identifiers are issued by DHS Medicare. There is one set for individual healthcare providers (HPI-Is), another set for healthcare organisations (HPI-Os), and the individual healthcare identifiers (IHIs) which are used for consumers.
- The PCEHR-compliant digital credential (see section 3.2), is the primary authentication mechanism. The PCEHR-compliant digital credential authentication service provides keys and certificates needed to access the B2B Gateway.

Every request has header information as described in section 4.4, and each header has a signature with the required keys, certificates and healthcare identifiers.

The full query and response messages, excerpts of which are given as samples in this document, are available in a zip file [[Schemas TSS](#)] on the Vendor Portal [<https://vendors.nehta.gov.au>].

### 2.2 Implementer Responsibilities

The responsibilities of implementers are to:

- Use the PCEHR B2B operations as described in the applicable standards, handbooks and NEHTA guides.
- Handle all error conditions appropriately, i.e. trap and process them.
- Validate data before submitting it to the PCEHR System according to CDA implementation guides and the CDA Validator.
- Minimise the risk to the PCEHR System with the design, implementation, testing and deployment of their software.
- Ensure implementation aligns with the PCEHR Logical Services Specification (LSS) and Technical Service Specification (TSS) documents.
- Ensure implementation aligns with the PCEHR CCA requirements.

# 3 Links to Supporting Material

## 3.1 Healthcare Identifiers

Healthcare identifiers are unique identifiers issued by the Department of Human Services (DHS) to identify individual healthcare providers, healthcare provider organisations and individuals who seek healthcare. Use of a unique identifier ensures that the right health information is associated with the right individual at the point of care. Using these identifiers is a prerequisite for accessing individuals' health information in the PCEHR System.

Throughout this document, these identifiers are referred to as:

- IHI - Individual Healthcare Identifier
- HPI-I - Healthcare Provider Identifier—Individual
- HPI-O - Healthcare Provider Identifier—Organisation

For more information see the following:

- Healthcare Identifiers (HI)  
<http://www.nehta.gov.au/our-work/healthcare-identifiers-hi>
- Medicare web page: Healthcare Identifiers Service  
<http://www.humanservices.gov.au/customer/services/medicare/healthcare-identifiers-service>

### 3.1.1 Healthcare Provider Identifiers for Organisations

A Healthcare Provider Identifier—Organisation (HPI-O) is a 16-digit number allocated to organisations that provide healthcare (such as hospitals or medical clinics).

This HPI-O is used by the PCEHR System to identify and authenticate the healthcare provider organisation that accesses each PCEHR and clinical information therein.

For more information see the following:

- NEHTA collateral for Healthcare Identifier Service:  
<http://www.nehta.gov.au/implementation-resources/national-infrastructure/EP-1060-2011>
- Medicare web page: for Healthcare Identifiers Service details  
<http://www.medicareaustralia.gov.au/public/health-identifier/index.jsp>
- Health Provider Identifier for Organisations (HPI-O) – Supplementary notes to help complete the application form 2978.1202  
[http://www.gpv.org.au/files/downloadable\\_files/Programs/IM-ICT/Howto%20-%20HPI-O%20Health%20Provider%20Identifier%20for%20Organisations%20v2.pdf](http://www.gpv.org.au/files/downloadable_files/Programs/IM-ICT/Howto%20-%20HPI-O%20Health%20Provider%20Identifier%20for%20Organisations%20v2.pdf)
- Medicare web page: For healthcare professionals registration and PKI certificates  
<http://www.medicareaustralia.gov.au/provider/index.jsp>

### 3.1.2 Healthcare Provider Identifiers for Individuals

The Healthcare Provider Identifier – Individual (HPI-I) is a 16-digit number allocated to individual healthcare providers. To be eligible for an HPI-I, a healthcare provider must provide a "health service" as defined in the Healthcare Identifiers Act 2010.

Two classes of individual healthcare providers are eligible for an HPI-I:

- Individual healthcare providers registered under a state or territory law which relates to the registration of a particular healthcare profession or individual healthcare providers registered under the national law with Australian Health Practitioner Regulation Agency (AHPRA).
- Individual healthcare providers who are members of a professional association that meets certain criteria set out under legislation.

The HPI-I is used in the PCEHR System to, for example, identify the author of a CDA document.

For more information see the following:

- NEHTA: Healthcare Identifier Service collateral  
<http://www.nehta.gov.au/implementation-resources/national-infrastructure/EP-1060-2011>
- DOHA: Healthcare Identifiers Service – Frequently Asked Questions  
<http://health.gov.au/internet/main/publishing.nsf/Content/pacd-ehealth-consultation-faqs>
- Medicare: Healthcare Identifiers Service -- Application to create, verify or merge an Individual Healthcare Identifier  
<http://www.medicareaustralia.gov.au/provider/health-identifier/files/create-verify-or-merge-individual-healthcare-identifier.pdf>

## 3.2 Digital Certificates

The PCEHR-compliant digital credential is a nationwide secure and authenticated service for healthcare organisations and personnel to exchange eHealth information.

The PCEHR-compliant digital credential addresses the need to ensure that eHealth transactions are private, traceable and conducted only by known entities. The National Authentication Service for Health (NASH) is Gatekeeper accredited – it will issue digital credentials, including digital certificates managed through the Public Key Infrastructure and secured by tokens such as smartcards. These credentials will assert identity when used to access eHealth systems (including the PCEHR System) that are enabled to use PCEHR-compliant digital credential authentication. All PCEHR System participants must be authenticated to the system. This includes healthcare provider organisations, contracted service providers, registered repositories and registered portals.

For more information see the following:

<http://www.medicareaustralia.gov.au/provider/vendors/pki/index.jsp#N1007B>

## 3.3 XDS.b

XDS.b is a specification for sharing documents between healthcare organisations, individual providers and the PCEHR System.

For more information see <https://vendors.nehta.gov.au> under “PCEHR Core System” then “PCEHR B2B Gateway”):

- PCEHR Document Exchange Service - Logical Service Specification [[DEX LSS](#)]
- PCEHR Document Exchange Service, Using the IHE XDS.b Platform - Technical Service Specification [[DEX TSS](#)]

## 3.4 Clinical Document Architecture (CDA) Packaging

The CDA Package Version [CDA PKG] specification provides eHealth software developers with information on mechanisms for encapsulating CDA documents for delivery. Signed CDA package with eSignatures are mandatory. The CDA package profile is applicable to PCEHR interactions.

## 3.5 CDA Documents

### 3.5.1 Creation

A CDA document, for example the clinical payload for a Shared Health Summary, may be designed by referring to the Shared Health Summary CDA Implementation Guide [CDA SHS IG] and the CDA Package Specification [CDA PKG].

### 3.5.2 Validation

When a CDA document is created, ensure that it conforms to the CDA Implementation Guide. A template from the Template Service and a CDA Validator may be used. The latter is provided through the NEHTA Test Interest Group [COLLAB TST GRP]

### 3.5.3 Rendering

The CDA Rendering Specification [CDA RNDR] addresses the rendering of CDA documents within eHealth software solutions. It provides specifications and constraints on the display of documents, and on their creation.

## 3.6 Time Synchronisation

Synchronising time across the PCEHR eco-system is essential to ensure the correctness of key timestamps between integrated systems and the PCEHR System. Time synchronisation is typically done by Network Time Protocol (NTP) or Simple Network Time Protocol (SNTP). In short, for a server to be synchronised, it will run an NTP or SNTP client. This client will connect to one of the dedicated and published (S)NTP servers in the region. The time synchronisation is thus an operating-system-level function where applications use libraries to query the operating system time stamp. Hence time synchronisation is not an application feature; it is a local installation feature. The IHE XDS framework also mandates NTP or SNTP for time synchronisation.

The following resources provide introductions to time synchronisation:

- [http://en.wikipedia.org/wiki/Network\\_Time\\_Protocol](http://en.wikipedia.org/wiki/Network_Time_Protocol)
- [http://www.ihe.net/Technical\\_Framework/upload/IHE\\_ITI\\_TF\\_Rev8-0\\_Vol2a\\_FT\\_2011-08-19.pdf](http://www.ihe.net/Technical_Framework/upload/IHE_ITI_TF_Rev8-0_Vol2a_FT_2011-08-19.pdf) section 3.1 references time synchronisation

### 3.6.1 PCEHR Timestamps

Time is stated in several layers in the PCEHR System integration:

- CDA Layer: In the actual CDA document
- XDS Layer: In the XDS Header
- Transport layer: In the PCEHR Common header

Different systems are generally involved in each of the layers above. For the purpose of this discussion, the following components are involved:



- A clinical system creates the CDA document. This can be a standard desktop PC residing on the local LAN in a hospital.
- An integration system creates the message body, which involves doing the XDS packaging and possibly signing the CDA document. This can be a server that the clinical system is integrated into for the purpose of communicating with PCEHR System.
- A gateway system does the actual communication to the PCEHR System. This involves creating the envelope of the message and connecting to the PCEHR System and sending the message. This is also likely to be a server-based system.

Naturally, there is a huge range of local architectures and above is one of many possibilities. The point to note here is that, for the purpose of this discussion, it cannot be assumed that all systems are a monolithic GP desktop system.

### 3.6.2 CDA Layer

Several time stamps are present in clinical documents. These time stamps are generally of a clinical safety nature, for example when an onset of a disease is observed, and the date and time must be recorded correctly. Therefore, the time stamps that occur in a clinical document are meaningful for synchronisation. Some examples are as follows:

- ClinicalDocument/effectiveTime – this is the creation date of the document and may be pre-set by the clinical information system that the author of the document uses to create the document.
- ClinicalDocument/legalAuthenticator/time – this is the approval time stamp and may be pre-set by the authoring or approving system.

Other dates in a clinical document, such as the “Estimated or actual date the Problem began, in the opinion of the clinician” need to be selected by the author.

### 3.6.3 XDS Layer

The XDS metadata contains some time stamps which are used in document lists, for example, and are thus associated with some clinical safety and usability requirements:

- Service Start time: The datetime the service being performed, which caused the document to be created, started.
- Service stop time: The Service Stop Time may be set to the same value as the Service Start Time in order to indicate the datetime of an event.
- Submission date time: The date and time that the document was submitted to the PCEHR System.
- Document creation time: The time the document was created.

The XDS document creation date should be the same as ClinicalDocument/effectiveTime and for shared health summary and event summary the service start / stop time should be the same as document creation date.

Only the Submission date time can be automatically set by the system when submitting the CDA document to the PCEHR System; the other dates have constraints where they must align to dates in the CDA document. Please refer to [Table 11: XSDocumentEntry](#). The exception is for discharge summaries.

### 3.6.4 Transport Layer

In the Common PCEHR header, a timestamp was introduced to support the ATS5821 implementation. The timestamp is signed and used to detect possible

man-in-the-middle attacks. This timestamp should be automatically generated when making the transmission.

### **3.6.5 Timestamps to Synchronise**

The way to implement time synchronisation is to synchronise the following date stamps:

- CDA: ClinicalDocument/effectiveTime. Possible but may be overridden locally.
- XDS: Submission timestamp: Recommended but the semantic of this field is the date when it was submitted locally. If the local implementation has a queue or a batch job to upload, or a local outage, this timestamp may differ considerably from the PCEHR System time when the message is received.
- TL: timestamp: Recommended and, unless this timestamp reconciles to the server within some time interval, the message may be rejected as a potential man-in-the-middle attack can otherwise not be assured.

### **3.6.6 Implementation**

The technology to do time synchronisation is mature; there are no known security issues with the technology and it is supported by all platforms that are likely to be used in the layers described in this document. It is strongly recommended that time synchronisation is deployed at each site integrating to the PCEHR System. There is a local system maintenance overhead in ensuring that the local (S)NTP client, (S)NTPd, is running. For resources on how to set up and run (S)NTP clients, see the following:

- <http://www.ntp.org/>
- <http://www.pool.ntp.org/en/>
- <http://defaultreasoning.com/2009/11/16/synchronize-time-with-external-ntp-server-on-windows-server-2008-r2/>

# 4 Web Services

## 4.1 Overview

The PCEHR System interfaces are exposed using Web Services.

Web Services is a systems interface technology designed to support interoperable system-to-system interaction over a network. It has an interface described in a machine-processable format: the Web Services Description Language (WSDL)<sup>1</sup>.

PCEHR System Web Service definition is described in the following technical service specifications (TSS):

- PCEHR Record Access Service Technical Service Specification [[RA TSS](#)]
- PCEHR Document Exchange Service Using the IHE XDS.b Platform Technical Service Specification [[DEX TSS](#)]
- PCEHR View Service Technical Service Specification [VIEW TSS]
- PCEHR Registration Service Technical Service Specification [Registration TSS]

PCEHR System Web Services conform to the following standards:

- E-health web services profiles (ATS5820) [ATS 5820-2010]
- E-health XML secured payload profiles (ATS5821) [ATS 5821-2010]

## 4.2 E-health Web Service Profile (ATS 5820-2010)

This standard designates the SOAP Web Service specification for the e-health ecosystem, to guarantee Web Services interoperability. The PCEHR B2B Gateway conforms to the Web Service Base Profile (Section 2 of [ATS 5820-2010](#)) and uses the Transport Layer Security (TLS) Security Profile (Section 8) to secure the service.

### 4.2.1 Transport Layer Security (TLS) Profile

The Transport Layer Security profile requires the service invoker and service provider to support a mutually authenticated connection. The PCEHR System requires the connected client to secure the connection using TLS mutual authentication using PCEHR-compliant digital X.509 HPI-O credential for Clinical Information System (CIS) or PCEHR-compliant X.509 credential for Contracted Service Provider (CSP).

### 4.2.2 WS-Addressing 1.0

Web Service Addressing 1.0 is used to define Web Service metadata within the PCEHR Web Services as follows:

- **MessageID**  
Message Id needs to be UUID (Universal Unique Id) as per Section 6.1.3.4.2 in ATS5820.
- **Action**  
This value needs to be populated with the value that is defined in WSDL.
- **To**  
This value needs to be set as  
"http://www.w3.org/2005/08/addressing/anonymous"

<sup>1</sup> Reference from [http://en.wikipedia.org/wiki/Web\\_service](http://en.wikipedia.org/wiki/Web_service)

### 4.3 E-health XML Secured Payload Profiles (ATS 5821-2010)

This specification defines a set of interoperable mechanisms for representing secured XML data for e-health. "Security" here refers to the use of digital signatures, cryptographic encryption, or a combination of both.

The PCEHR System uses XML Signature Profile (see section 4 of [ATS 5821-2010]) to provide data and transaction provenance for all Web Service communications. All communications to and from the PCEHR System require the Service Invoker to provide a digital signature for the following SOAP Element, and be represented as per ATS 5821 specification:

- SOAP/Header/Timestamp
- SOAP/Header/PCEHRHeader
- SOAP/Body

Examples of complete headers are given in section 10.

#### *Example of a secured payload*

```

http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    .....
    <h:signature xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
      <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
        <SignedInfo>
          <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
          <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-sha1" />
          <Reference URI="#body-2845e392-2d1c-4f49-ba7b-174dc91b0230">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
            </Transforms>
            <DigestMethod Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
            <DigestValue>Eugj0fWhIX3a8oXueQx5Oyu997c=</DigestValue>
          </Reference>
          <Reference URI="#user-72e59b6d-5576-4b6a-bf05-3dca6a6e6c8c">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
            </Transforms>
            <DigestMethod Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
            <DigestValue>S+Hca1vkQhjlneE32SISCMmcU5EM=</DigestValue>
          </Reference>
          <Reference URI="#time-15446806-bbad-4ac5-b784-531f2b0f5512">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
            </Transforms>
            <DigestMethod Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
            <DigestValue>EueYIciHEthFTxQjrV9X5Yjj1lg=</DigestValue>
          </Reference>
        </SignedInfo>
        <SignatureValue>
          Zqk1Bah.....o6ngRjVQ==
        </SignatureValue>
        <KeyInfo>
          <X509Data>
            <X509Certificate>
              MIIUuj.....ELQNIYA
            </X509Certificate>
          </X509Data>
        </KeyInfo>
      </Signature>
    </h:signature>
    .....
  </s:Header>

```

## 4.4 Common PCEHR Header

All Web Service communication to the PCEHR System requires the Service Invoker to provide information for the purpose of authorisation and auditing. This information is passed in the common element on all PCEHR System Web Service interfaces, called PCEHRHeader.

### 4.4.1 Overview

PCEHRHeader defines the following information:

- **User**  
This field is used to record information of the end user of this Web Service interface; this information is used for the purpose of auditing. Only the `role` sub-element is optional.
- **ihiNumber**  
This field is for the Individual PCEHR's IHI number. This element is not required for certain operations, such as Template Services.
- **productType**  
Contains `vendor`, `productName` and `productVersion` and the non-mandatory `platform`. These fields are used to record the Service Invoker system information for the purpose of authorisation (i.e. whether the Service Invoker system is the legitimate system that has previously passed CCA and NOC testing). `productType` is mandatory.
- **clientSystemType**  
This field is used to record the Service Invoker system role. This is mandatory.
- **accessingOrganisation**  
This field is used to record the Accessing Organisation that the Service Invoker is currently acting on behalf of. The elements `organisationID` and `organisationName` are mandatory.

#### Example

```

http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    .....
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCore
Elements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElement
s/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org
/2001/XMLSchema" xml:id="user-72e59b6d-5576-4b6a-bf05-3dca6a6e6c8c">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <ihiNumber>8003608833337025</ihiNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003626566674315</organisationID>
        <organisationName>Local Practice</organisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    .....
  </s:Header>

```

## 4.4.2 Clinical Information Systems

This following information defines how to populate information into the PCEHRHeader for a clinical information system (CIS):

- When the end user has a known HPI-I number, this number **SHALL** be populated to the `User.ID` field, and the `User.IDType` must be `HPII`. If the end user does not have any HPI-I number, the local system identifier **SHALL** be populated with the `User.ID` field and the `User.IDType` **SHALL** be `LocalSystemIdentifier`.
- `User.userName` field is mandatory and **SHALL** be populated on every service call made to the PCEHR System. It **SHALL** be populated with the end user's name.
- The end user **MAY** choose to not disclose their name to the PCEHR System Audit Log. In such case, the end user then discloses only their role by populating `User.role` field and set the `User.useRoleForAudit` to `true`.
- `clientSystemType` **SHALL** be set to `CIS` in all Web Service calls.
- When the Service Invoker is uploading or updating document, `User.ID` **SHALL** be the end user's HPI-I number and the `User.IDType` **SHALL** be `HPII`.
- `accessingOrganisation.organisationID` **SHALL** be the same as the HPIO number in the certificate that is used for TLS.
- The Service Invoker accessing organisation **MAY** choose to disclose a different organisation name on the PCEHR Audit log by populating `accessingOrganisation.alternameOrganisationName`.

## 4.4.3 Contracted Service Providers

A contracted service provider (CSP) provides information technology services relating to the communication of health information or health information management services under contract to healthcare provider organisations registered with the HI Service. Before a CSP organisation can access the HI Service on the healthcare organisation's behalf, it must be registered with the HI Service and be linked to a registered healthcare organisation.

This following information is a guide to populate information into the PCEHRHeader for a Contracted Service Provider (CSP) system:

- When the end user has a known HPI-I number, this number **SHALL** be populated with the `User.ID` field, and the `User.IDType` **SHALL** be `HPII`. If the end user does not have any HPI-I number, local system identifier **SHALL** be populated with the `User.ID` field and the `User.IDType` **SHALL** be `LocalSystemIdentifier`.
- `User.userName` field is a mandatory field that **SHALL** be populated on every service call made to the PCEHR System. This **SHALL** be populated with the end user's name.
- The end user **MAY** choose to not disclose their name to the PCEHR System Audit Log. In such case, the end user discloses only their role by populating `User.role` field and set the `User.useRoleForAudit` to `true`.
- `clientSystemType` **SHALL** be set to `CSP` in all Web Service calls.
- When the Service Invoker is uploading or updating document, `User.ID` **SHALL** be the end user's HPI-I number and `User.IDType` **SHALL** be `HPII`.

## 4.5 WSDL and XSD Variation

### 4.5.1 Overview

Some of WSDL and XDS files may require editing due to limitations of some of the WSDL client toolkits. Without these modifications, these toolkits may not work as expected.

### 4.5.2 rim.xsd on .NET and Java Environments

The RIM.XSD must be modified for Java and .NET to support XDS interface operations. This is because the .NET `SVCUTIL.EXE` tool does not support the substitution groups defined in the schema and the four complex types must be explicitly defined in the Registry Object List Type. Java also does not support these definitions in the schema.

In the following example, the modifications are highlighted in yellow.

```
<complexType name="RegistryObjectType">
  <sequence>
    <!--ADDED THESE 4 ENTRIES IN TO GET AROUND JAVA AND SVCUTIL NOT
SUPPORTING substitutionGroup="tns:Identifiable" -->
    <!--HAS TO BE IN THIS ORDER AS THIS IS HOW IT COMES BACK FROM ORACLE
INTERFACE -->
    <element maxOccurs="unbounded" minOccurs="0" ref="tns:ExtrinsicObject"/>
    <element maxOccurs="unbounded" minOccurs="0" ref="tns:RegistryPackage"/>
    <element maxOccurs="unbounded" minOccurs="0" ref="tns:Classification"/>
    <element maxOccurs="unbounded" minOccurs="0" ref="tns:Association"/>
    <!--END OF MODIFICATION -->
    <element maxOccurs="unbounded" minOccurs="0" ref="tns:Identifiable"/>
  </sequence>
</complexType>
```

# 5 Using the B2B Gateway Interface

## 5.1 Overview

The B2B interface is the API used by software developers to integrate the PCEHR System core functions with their product.

## 5.2 PCEHR B2B Gateway Operations

A short summary of the full set of use cases for a CIS [[CIS UC](#)] is as follows:

- Verify that a PCEHR exists
- Gain access to a PCEHR
- Gain access to a PCEHR Using "Emergency Access"
- Gain subsequent access to a PCEHR
- Re-authorise access to a PCEHR
- Retrieve a clinical document
- Search for a clinical document
- Upload a clinical document
- Remove a clinical document
- Amend a clinical document
- Retrieve document list
- Access a view
- Assisted registration

See [Appendix F](#) for a description of use cases that are relevant to a clinical information system.

## 5.3 Conformance and System Behaviour

Third party products **SHALL** behave according to the conformance points in the technical service specifications.

## 5.4 Local Storage

Because the B2B operations require some orchestration, data obtained from earlier responses may need to be stored and cached locally for use in subsequent operations. One example is Document IDs for submitted documents.



# 6 Record Access

## 6.1 Overview

The Record Access operations:

- test whether the healthcare provider can access a PCEHR, and whether an access code is required for access
- can grant the healthcare provider access to an individual's PCEHR using an access code or emergency assertion.

## 6.2 doesPCEHRExist

### 6.2.1 Request

**Name of Request:** doesPCEHRExist

This operation checks whether a PCEHR exists and can be accessed for a particular `ihiNumber` (given in the PCEHR Header).

The request may be used before a `gainPCEHRAccess` request (see section 6.3) where the `ihiNumber` is already known. It tests whether a PCEHR can be accessed and whether an access code is required. If the response indicates that the PCEHR does not exist, it means either that there is no PCEHR record, or that access has been denied.

#### Inputs

In the case of `doesPCEHRExist`, the only input is the standard PCEHR header (see section 4.4).

#### Example

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/doesPCEHRExistRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-72e59b6d-5576-4b6a-bf05-3dca6a6e6c8c">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <ihiNumber>8003608833337025</ihiNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003626566674315</organisationID>
        <organisationName>Local Practice</organisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature .....>
      .....
```

```

</h:signature>
.....
<MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:903ab8f0-0a39-41ae-b
03d-385740dbfa33</MessageID>
.....
</s:Header>
<s:Body xml:id="body-2845e392-2d1c-4f49-ba7b-174dc91b0230">
  <doesPCEHRExist xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/PCEHRPr
ofile/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xsi:type="xsd:string"/>
</s:Body>
</s:Envelope>

```

### Coding Tips

In a .NET environment when the client code is generated using the ServiceModel Metadata Utility Tool (svcutil.exe), the doesPCEHRExist input object needs to be set to an empty string so that the request message <doesPCEHRExist> appears in the SOAP message.

```

doesPCEHRExistRequest requestMsg = new doesPCEHRExistRequest();
requestMsg.doesPCEHRExist = "";

```

## 6.2.2 Response

**Name of response:** doesPCEHRExistResponse

### Outputs

See doesPCEHRExist section of *PCEHR Record Access Service Technical Service Specification* [RA TSS] for the current list of elements in the outputs, their data types, cardinality and conformance points.

Table 3: doesPCEHRExistResponse elements

Level 1 Element	Level 2 Element	Card	Explanation
DoesPCEHRExistResponse		1..1	
	PCEHRExists	1..1	false   true The default value is false. Value is set to true if PCEHR exists for the <code>ihiNumber</code> , and the accessing organisation has not been put on the individual's revoked list, and the disclosure indicator is set to <i>disclose</i>
	accessCodeRequired	0..1	If PCEHR is false, this element will set to null. If PCEHR is true, then possible values are: <code>withCode</code>   <code>withoutCode</code>   <code>AccessGranted</code>

If the accessingOrganisation is in the individual's access list, but access has been revoked, the PCEHRExists element will be `false` and `accessCodeRequired` will be `null`.

Table 4: business explanation of the accessCodeRequired values

accessCodeRequired	Explanation
withCode	Access Code must be supplied to access PCEHR
withoutCode	Access code is not needed to access the PCEHR
AccessGranted	Access has been granted

A more detailed version of this table is given in section "Does PCEHR exist" of the *PCEHR Participation and Authorisation Functional Overview* [PA FUNC].

See section "Key Participation and Authorisation Concepts" of the same overview for further detail on access lists and disclosure indicators.

### Example

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/doesPCEHRExistResponse
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:1c09f4cc-2c5f-4750-a2e0-6056f6dc7843</wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:903ab8f0-0a39-41ae-b03d-385740dbfa33</wsa:RelatesTo>
    <ns:signature .....
      .....
    </ns:signature>
  </soap:Header>
  <S:Body xmlns:S="http://www.w3.org/2003/05/soap-envelope" xml:id="Id-0001339719846222-74d7a1ef4fda80a61409abc3-2">
    <ns:doesPCEHRExistResponse xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/PCEHRProfile/1.0">
      <ns:PCEHRExists>true</ns:PCEHRExists>
      <ns:accessCodeRequired>AccessGranted</ns:accessCodeRequired>
    </ns:doesPCEHRExistResponse>
  </S:Body>
</soap:Envelope>
```

### Error

In this case, the PCEHR System will return a SOAP Fault indicating that there has been an error in processing the message.

Standard Error message will be returned in the SOAP Fault detail.

### Example

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header><wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/Fault/standardError</wsa:Action><wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">uuid:Id 0001337125703555 5e49b1384fb2eb4705190000 1</wsa:MessageID><wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:413fef93 1564 4916 accb 609e815fa811</wsa:RelatesTo></soap:Header>
  <soap:Body>
    <soap:Fault>
      <soap:Code>
        <soap:Value>soap:Sender</soap:Value>
      </soap:Code>
      <soap:Reason>
        <soap:Text xml:lang="en AU">PCEHR_ERROR</soap:Text>
      </soap:Reason>
      <soap:Detail>
        <ns2:standardError xmlns:ns2="http://ns.electronichealth.net.au/wsp/xsd/StandardError/2010">
          <ns2:errorCode>badParam</ns2:errorCode>
          <ns2:message>PCEHR_ERROR_0505 Invalid HPI O</ns2:message>
        </ns2:standardError>
      </soap:Detail>
    </soap:Fault>
  </soap:Body>
</soap:Envelope>
```

## 6.3 gainPCEHRAccess

### 6.3.1 Request

**Name of request:** gainPCEHRAccess

In this operation, the PCEHR individual is identified with the `ihiNumber` in the PCEHRHeader.

If access is granted, with or without the requirement of an access code, the response returns the individual's details, including the `ihiNumber`, and the status of the PCEHR (in the `ihiStatus` element).

If access is not granted, there is a mechanism to request temporary emergency access.

#### Inputs

**PCEHRHeader** (see section 4.4).

#### gainPCEHRAccess

See gainPCEHRAccess section of *PCEHR Record Access Service, Technical Service Specification [RA TSS]* for the current list of the elements in the inputs, their data types, cardinality and the conformance.

Table 5: gainPCEHRAccess message inputs

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
PCEHRRecord			1..1	
	AuthorisationDetails		1..1	See <i>RegistryObjectList</i> for submitting a new document or an amendment.
		accessType	1..1	AccessCode   EmergencyAccess The <i>accessType</i> is usually <i>AccessCode</i> . If the access code is not known in an emergency, the <i>accessType</i> can be set to <i>EmergencyAccess</i> and temporary access will be granted.
		accessCode	0..1	This element is set to the value of the access code. If access to the PCEHR does not require a code, this element is set to <code>null</code> .

#### Example

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/gainPCEHRAccessRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-b08e7b78-313b-41d8-9b73-f6ee95b87bff">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <ihiNumber>8003608833337025</ihiNumber>
    </h:PCEHRHeader>
  </s:Header>
  <s:Body>
    <PCEHRRecord>
      <AuthorisationDetails>
        <accessType>AccessCode</accessType>
        <accessCode></accessCode>
      </AuthorisationDetails>
    </PCEHRRecord>
  </s:Body>
</s:Envelope>
```

```

    <productType>
      <vendor>Oracle</vendor>
      <productName>dummyCISusr1</productName>
      <productVersion>dummyCISusrV1</productVersion>
      <platform>Windows XP</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
      <organisationID>8003626566674315</organisationID>
      <organisationName>Local Practice</organisationName>
    </accessingOrganisation>
  </h:PCEHRHeader>
  <h:signature .....>
    .....
  </h:signature>
  .....
  <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:3260deb7-92c7-4acb-9
a05-2c78b1309812</MessageID>
  .....
</s:Header>
<s:Body xml:id="body-5b239ccb-425c-4b16-b1c0-09f533e9d454">
  <gainPCEHRAccess xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/PCEHRP
rofile/1.0">
    <PCEHRRecord>
      <authorisationDetails>
        <accessType>EmergencyAccess</accessType>
      </authorisationDetails>
    </PCEHRRecord>
  </gainPCEHRAccess>
</s:Body>
</s:Envelope>

```

### 6.3.2 Response

**Name of Response:** gainPCEHRAccessResponse

#### Outputs

See gainPCEHRAccess section of *PCEHR Record Access Service, Technical Service Specification [RA TSS]* for the current list of the elements in the outputs, their data types, cardinality and the conformance.

Table 6: gainPCEHRAccessResponse message elements

Level 1 Element	Level 2 Element	Level 3 Element	Level 4 Element	Card	Explanation
GainPCEHRAccessResponse				1..1	
	ResponseStatus			1..1	Success or Failure
		Code		1..1	PCEHR_SUCCESS or PCEHR_ERROR_XXXX
		Description		1..1	Success or [Error Description]
		Details		0..1	
	Individual				
		ihiNumber		1..1	Individual Health Identifier
		medicareCardNumber		0..1	The Medicare card number
		medicareIRN		0..1	The patient's Individual Reference Number (where there several patients

Level 1 Element	Level 2 Element	Level 3 Element	Level 4 Element	Card	Explanation
					listed on the one Medicare card)
		dvaFileNumber		0..1	File Number for the Department of Veteran Affairs
		militaryHealthNumber		0..1	This element supports the Australian Defence Force's Joint eHealth Data Initiative (JeDHI)
		ihiRecordStatus		1..1	Verified   Unverified
		ihiStatus		1..1	Active   Deceased   Retired   Resolved   Expired
		dateOfBirth		1..1	Given in date format ("xs:date")
		dateAccuracyIndicatorType		1..1	<Day accuracy><Month accuracy><Year Accuracy> where A=accurate E=estimate U=unknown Example: AUE Accurate day, unknown month, estimated year.
		Sex		1..1	M   F   I   N where: M=Male, F=Female, I=Intersex or Indeterminate, N=Not specified.
		Name			
			nameTitle	0..1	These are specified by Medicare and defined in the PCEHR_CommonTypes_Supplementary schema. A few examples: MR   MRS   MS   DR   Nurse
			familyName	1..1	String
			givenName	0..2	String
			nameSuffix	0..1	These are specified by Medicare and defined in the PCEHR_CommonTypes_Supplementary schema. A few examples: ESQ   JNR   SNR   OA   MP   MD
			nameAlias	0..1	Defined as "any other name the person is known by".

### Example

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/gainPCEHRAccessResponse
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:16ea4b94-195c-4caf-8094-67dff4051586</wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:3260deb7-92c7-4acb-9a05-2c78b1309812</wsa:RelatesTo>
    <ns:signature .....>
  </soap:Header>
</soap:Envelope>
```

```

.....
</ns:signature>
</soap:Header>
<S:Body xmlns:S="http://www.w3.org/2003/05/soap-envelope" xml:id="Id-0001339720147394-f
91504044fda81d308f993ab-2">
  <ns:gainPCEHRAccessResponse xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/int
erfaces/PCEHRProfile/1.0">
    <ns:responseStatus>
      <ns1:code xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCor
eElements/1.0">PCEHR_SUCCESS</ns1:code>
      <ns1:description xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/Co
mmonCoreElements/1.0">SUCCESS</ns1:description>
    </ns:responseStatus>
    <ns:individual>
      <ns1:ihiNumber xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/Comm
onCoreElements/1.0">8003608833337025</ns1:ihiNumber>
      <ns:ihiRecordStatus>Verified</ns:ihiRecordStatus>
      <ns:ihiStatus>Active</ns:ihiStatus>
      <ns:dateOfBirth>1966-09-07</ns:dateOfBirth>
      <ns1:dateAccuracyIndicatorType xmlns:ns1="http://ns.electronichealth.net.au/pcehr
/xsd/common/CommonCoreElements/1.0">AAA</ns1:dateAccuracyIndicatorType>
      <ns1:sex xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCore
Elements/1.0">M</ns1:sex>
      <ns:name>
        <ns1:familyName xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/C
ommonCoreElements/1.0">JUSTICE</ns1:familyName>
        <ns1:givenName xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/Co
mmonCoreElements/1.0">FERDINAND</ns1:givenName>
      </ns:name>
    </ns:individual>
  </ns:gainPCEHRAccessResponse>
</S:Body>
</soap:Envelope>

```

## Error

There are two types of errors returned by the PCEHR System:

- **Standard Error**, the PCEHR System will return this error when there is a Web Services Error as per ATS5820 specification during the transaction. This error will be returned as SOAP Fault.

## Example

```

<?xml version="1.0" encoding="UTF-8"?>
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope" xmlns:wsa="http://www.
w3.org/2005/08/addressing">
  <soap:Header>
    <wsa:Action>http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfil
ePortType/Fault/standardError</wsa:Action>
    <wsa:MessageID>uuid:Id-0001337127076028-102367654fb2f0a416790000-1</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:7839497d-5fab-4aa6-ab21-4e8d7118c28d</wsa:RelatesTo>
  </soap:Header>
  <soap:Body>
    <soap:Fault>
      <soap:Code>
        <soap:Value>soap:Sender</soap:Value>
      </soap:Code>
      <soap:Reason>
        <soap:Text xml:lang="en-AU">PCEHR_ERROR</soap:Text>
      </soap:Reason>
      <soap:Detail>
        <ns2:standardError xmlns:ns2="http://ns.electronichealth.net.au/wsp/xsd/Stan
dardError/2010">
          <ns2:errorCode>badParam</ns2:errorCode>
          <ns2:message>PCEHR_ERROR_0505 - Invalid HPI-O</ns2:message>
        </ns2:standardError>
      </soap:Detail>
    </soap:Fault>
  </soap:Body>
</soap:Envelope>

```

- **Functional Error**, the PCEHR System will return this error when there is a functional or business error during the transaction. This error will be returned in the *responseStatus* within the SOAP Body. See [Appendix E](#).

### Example

```
<?xml version="1.0" encoding="utf-8"?>
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope" xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/CanonicalModel/0.1" xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/gainPCEHRAccessResponse</wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:8262970e-9a65-4771-8632-12f6bb148aa5</wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:64a42f96-db4e-447d-a11c-fe925cbd0864</wsa:RelatesTo>
    <ns:signature>...</ns:signature>
  </soap:Header>
  <soap:Body xml:id="Id-0001337127802352-76fd83944fb2f37a07d90000-2">
    <ns1:gainPCEHRAccessResponse xmlns:S="http://www.w3.org/2003/05/soap-envelope" xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/PCEHRProfile/1.0">
      <ns1:responseStatus>
        <ns1:code>PCEHR_ERROR_5103</ns1:code>
        <ns1:description>PCEHR is found but Access Code is invalid</ns1:description>
      </ns1:responseStatus>
    </ns1:gainPCEHRAccessResponse>
  </soap:Body>
</soap:Envelope>
```

### Functional Errors

Table 7: *gainPCEHRAccessResponse* message functional error codes

Code	Explanation
PCEHR_SUCCESS	SUCCESS
PCEHR_ERROR_5101	PCEHR record not found
PCEHR_ERROR_5102	PCEHR is found but access code is required
PCEHR_ERROR_5103	PCEHR is found but access code is invalid
PCEHR_ERROR_5104	You are not authorised to access this record
PCEHR_ERROR_5001	The family name contains invalid characters
PCEHR_ERROR_5002	The birth year must not be before 1800
PCEHR_ERROR_5003	The date of birth must not be in the future
PCEHR_ERROR_5004	Medicare card fails check digit routine
PCEHR_ERROR_5005	The given name contains invalid characters
PCEHR_ERROR_5006	No unique active IHI found
PCEHR_ERROR_5007	IHI number fails the check digit routine
PCEHR_ERROR_5008	No unique active IHI found
PCEHR_ERROR_5009	Multiple search criteria keyed. Please refine the search criteria.
PCEHR_ERROR_5010	No unique active IHI found
PCEHR_ERROR_5011	The DVA file number entered is invalid
PCEHR_ERROR_5012	No unique active IHI found
PCEHR_ERROR_5013	IHI number must be 16 digits



# 7 Document Exchange

## 7.1 Overview

The Document Exchange operations are:

- Submit the document to the PCEHR System using XDS.b ITI-41.
- Replace an existing document in the PCEHR System using XDS.b ITI-41.
- Retrieve the document from the PCEHR System using XDS.b ITI-43.
- Find documents in the PCEHR System using XDS.b ITI-18.
- Remove document from the PCEHR System.

All clinical documents **SHALL** be a CDA document packaged according to the CDA Packaging specification. See section 3.5 for further information on how to package the CDA document.

## 7.2 ITI-41 Provide and Register Document Set – b

The PCEHR System uses ITI-41 Provider and Register Document Set-b to allow a client system to submit a new document to the PCEHR System. If successful, the document will be registered and stored in the PCEHR System.

The client system can also use ITI-41 to submit an amendment to the document previously uploaded, by providing more information. See Table 10 on page 34 for more details.

### 7.2.1 ProvideAndRegisterDocumentSetRequest

#### 7.2.1.1 Request

**Request Name:** ProvideAndRegisterDocumentSetRequest

PCEHRHeader (see section 4.4)

#### ProvideAndRegisterDocumentSetRequest

See ITI-41 Provide & Register Document Set – b section of the PCEHR Document Exchange Service Using the IHE XDS.b Platform [DEX TSS].

```
<?xml version="1.0" encoding="utf-8" ?>
- <s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
+ <s:Header>
- <s:Body xml:id="body-d27d4080-3ec6-4141-a1b8-6ee761f49f12">
- <ProvideAndRegisterDocumentSetRequest xmlns="urn:ihe:iti:xds-b:2007">
- <SubmitObjectsRequest xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:lcm:3.0">
- <RegistryObjectList xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0">
+ <ExtrinsicObject mimeType="application/zip" objectType="urn:uuid:7edca82f-054d-47f2-a032-9b2a5b5186c1" id="DOCUMENT_SYMBOLICID_01">
+ <RegistryPackage objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:RegistryPackage" id="SUBSET_SYMBOLICID_01">
  <Classification classificationNode="urn:uuid:a54d6aa5-d40d-43f9-88c5-b4633d873bdd" classifiedObject="SUBSET_SYMBOLICID_01"
  objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="cl10" />
+ <Association targetObject="DOCUMENT_SYMBOLICID_01" sourceObject="SUBSET_SYMBOLICID_01" associationType="urn:oasis:names:tc:ebxml-
  regrep:AssociationType:HasMember" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Association" id="as01">
  </RegistryObjectList>
</SubmitObjectsRequest>
<Document
  id="DOCUMENT_SYMBOLICID_01">
</ProvideAndRegisterDocumentSetRequest>
</s:Body>
</s:Envelope>
```

Table 8: ProvideAndRegisterDocumentSetRequest

Level 1 Element	Level 2 Element	Card	Explanation
SubmitObjectRequest		1..1	XDS Metadata
	RegistryObjectList	1..1	See <i>RegistryObjectList</i> for submitting new document or an amendment.
Document		1..1	The element id is the XDSDocumentEntry symbolic Id.
		1..1	CDA Package in base64 string

Table 9: RegistryObjectList – New Document

Level 1 Element	Level 2 Element	Card	Explanation
RegistryObjectList		1..1	XDS Metadata
	ExtinsicObject	1..1	See XDSDocumentEntry
	RegistryPackage	1..1	See XDSSubmissionEntry
	Classification	1..1	XDSSubmissionSet
	Association	1..1	Association type is XDS_ASSOCIATION_TYPE_HAS_MEMBER, see <a href="#">Appendix C</a> for the Object Id. Target object is the XDSDocumentEntry symbolic Id. Source object is the XDSSubmissionEntry symbolic Id.

Table 10: RegistryObjectList – Amend Document

Level 1 Element	Level 2 Element	Card	Explanation
RegistryObjectList		1..1	XDS Metadata
	ExtinsicObject	1..1	See XDSDocumentEntry
	RegistryPackage	1..1	See XDSSubmissionEntry
	Classification	1..1	See XDSSubmissionSet
	Association	1..1	Association type is XDS_ASSOCIATION_TYPE_HAS_MEMBER, see <a href="#">Appendix C</a> for the Object Id. Target object is the XDSDocumentEntry symbolic Id. Source object is the XDSSubmissionEntry symbolic Id.
	Association	1..1	Association type is XDS_ASSOCIATION_TYPE_RPLC, see <a href="#">Appendix C</a> for the Object Id Target Object is the Previous Document registry unique identifier. Please see section <a href="#">Appendix B</a> for Get Document Query Type. Source object is the XDSSubmissionEntry symbolic Id.

Table 11: XDSDocumentEntry

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
ExtrinsicObject			1..1	Object type is XDS_DOCUMENT_ENTRY, see <a href="#">Appendix C</a> for the Object Id. Id is the a Symbolic Id which later on will be referenced in the Document element, Association, etc.
	creationTime		1..1	This is populated from CDA document, see <a href="#">Appendix D</a> Note: when the time in CDA document contains Timezone information, the timezone needs to be removed from the creationTime Field.
	languageCode		1..1	See <a href="#">Appendix D.1</a>
	serviceStartTime		1..1	See <a href="#">Appendix D.1</a>
	serviceStopTime		1..1	See <a href="#">Appendix D.1</a>
	sourcePatientId		1..1	See <a href="#">Appendix D.1</a>
	name		1..1	Document Name
	Classification		1..1	Classification scheme XDS_DOCUMENT_ENTRY_AUTHOR, see <a href="#">Appendix C</a> for the Object Id
		authorInstitution	1..1	This is populated from CDA document, see <a href="#">Appendix D.1</a>
		authorPerson	1..1	This is populated from CDA document, see <a href="#">Appendix D.1</a>
	Classification		1..1	Classification scheme XDS_DOCUMENT_CLASS_CODE, see <a href="#">Appendix C</a> for the Object Id. nodeRepresentation is CDA Document classCode, see <a href="#">Appendix D.1</a>
		codingScheme	1..1	LOINC
		name	1..1	LOINC Code display name
	Classification		1..1	Classification scheme XDS_DOCUMENT_FORMAT_CODE, see <a href="#">Appendix C</a> for the Object Id. nodeRepresentation is document template OID See <a href="#">Appendix A</a> .
		codingScheme	1..1	"PCEHR_FormatCodes"
		name	1..1	Template Name
	Classification		1..1	Classification scheme XDS_DOCUMENT_ENTRY_HEALTHCARE_FACILITY_TYPE_CODE, see <a href="#">Appendix C</a> for the Object Id. nodeRepresentation is the ANZIC Concept Code see section <a href="#">Appendix A</a> for the Facility Type Codes
		codingScheme	1..1	ANZIC
		name	1..1	ANZIC Code Display Name

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
	Classification		1..1	Classification scheme XDS_DOCUMENT_ENTRY_PRACTICE_SETTING_CODE, see <a href="#">Appendix C</a> for the Object Id. nodeRepresentation is the ANZIC Concept Code, see <a href="#">Appendix A</a> for the Practice Setting Codes
		codingScheme	1..1	ANZIC
		name	1..1	ANZIC Code Display Name
	Classification		1..1	Classification scheme XDS_DOCUMENT_ENTRY_TYPE_CODE, see <a href="#">Appendix C</a> for the Object Id. nodeRepresentation is CDA Document classCode, see <a href="#">Appendix D.1</a>
		codingScheme	1..1	LOINC
		name	1..1	LOINC Code Display Name
	ExternalIdentifier		1..1	IdentificationScheme is XDS_DOCUMENT_ENTRY_PATIENT_ID; see <a href="#">Appendix C</a> for the Object Id. Value is patientId from CDA Document, see <a href="#">Appendix D.1</a>
		name	1..1	"XDSDocumentEntry.patientId"
	ExternalIdentifier		1..1	IdentificationScheme is XDS_DOCUMENT_ENTRY_UNIQUE_ID; see <a href="#">Appendix C</a> for the Object Id and [VS TSS] XDS.b Association types. Value is uniqueId from CDA Document, see <a href="#">Appendix D.1</a> If the document is being replaced it must either provide the XDS Metadata Object in the format of a UUID, or the original document ID in the format of an OID.)
		name	1..1	"XDSDocumentEntry.uniqueId"

Table 12: XDSSubmissionSet

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
RegistryPackage			1..1	Object type is XDS_REGISTRY_PACKAGE, see <a href="#">Appendix C</a> for the Object Id Id is the Symbolic Id for submission, this Id will be reference in the association and XDSDocumentSet.
	submissionTime		1..1	Datetime when the XDS message is created
	Classification		1..1	Classification scheme XDS_SUBMISSION_SET_AUTHOR, see <a href="#">Appendix C</a> for the Object Id.
		authorInstitution	1..1	authorOrgName + "^^^^^^^^" + authorOrgId, see <a href="#">Appendix D.1</a> how to obtain it from the CDA document
		authorPerson	1..1	^authorFamily^authorGiven^^^authorPrefix^^^&authorHPII&ISO, see <a href="#">Appendix D.1</a> how to obtain it from the CDA document

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
	Classification		1..1	Classification scheme XDS_SUBMISSION_SET_CONTENT_TYPE_CODE, see <a href="#">Appendix C</a> for the Object Id.
		codingScheme	1..1	LOINC
		name	1..1	LOINC Code display name
	ExternalIdentifier		1..1	IdentificationScheme is XDS_SUBMISSION_SET_UNIQUE_ID, see <a href="#">Appendix C</a> for the Object Id. Value is uniqueId from CDA Document, see <a href="#">Appendix D.1</a>
		name	1..1	"XDSSubmissionSet.uniqueId"
	ExternalIdentifier		1..1	IdentificationScheme is XDS_SUBMISSION_SET_SOURCE_ID, see <a href="#">Appendix C</a> for the Object Id. Value is authorInstitution from CDA Document, see <a href="#">Appendix D.1</a>
		name	1..1	"XDSSubmissionSet.sourceId"
	ExternalIdentifier		1..1	IdentificationScheme is XDS_SUBMISSION_SET_PATIENT_ID, see <a href="#">Appendix C</a> for the Object Id. Value is patientId from CDA Document, see <a href="#">Appendix D.1</a>
		name	1..1	"XDSSubmissionSet.patientId"

### Coding Tips

When populating the XDS metadata, take content directly from the CDA document you are uploading, to guarantee that the PCEHR System will validate the same data. Otherwise the PCEHR System will return "PCEHR\_ERROR\_3002 – Document metadata failed validation"

Note: Each field may present the data item in a different format, but the underlying value **SHALL** be the same.

For example: IHI = 8003601234567890 =  
8003601234567890^^^&1.2.36.1.2001.1003.0&ISO

Table 13: CDA Document field correspondences

PCEHR header	Metadata Field	CDA Document	Validation
ihiNumber	- XDSDocumentEntry.sourcePatientId - XDSDocumentEntry.patientId - XDSSubmissionSet.patientId	/cda:ClinicalDocument/cda:recordTarget/cda:patientRole/cda:patient/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='IHI']/@root	These three fields SHALL have the same IHI number.

PCEHR header	Metadata Field	CDA Document	Validation
User.ID	- XDSDocumentEntry.authorPerson - XDSSubmissionSet.authorPerson	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='HPI-I']/@root	These three fields SHALL have the same HPI-I number.
AccessingOrganisation.ID	- XDSDocumentEntry.authorInstitution - XDSSubmissionSet.authorInstitution - XDSSubmissionSet.sourceID	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/ext:asEmployment/ext:employerOrganization/cda:asOrganizationPartOf/cda:wholeOrganization/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='HPI-O']/@root	These three fields SHALL have the same HPI-O number.
N/A	- XDSDocumentEntry.uniqueId	/cda:ClinicalDocument/cda:id/@root	These two fields SHALL have the same OID (or in the case of a UUID, calculated to be the same).

### Example

The following is an example of a document being submitted for the first time with a *ProvideAndRegisterDocumentRequest* (where most instances of the SignatureValue, X509Certificate and Document have been replaced with "....."):

```
<s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <a:Action s:mustUnderstand="1">urn:ihe:iti:2007:ProvideAndRegisterDocumentSet-
b</a:Action>
    <h:PCEHRHeader
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xml:id="header-9db57655-08ed-413b-b4bd-8acb4bff8033">
    <User>
      <IDType>HP11</IDType>
      <ID>8003618334357646</ID>
      <username>JoeBloggs</username>
      <useRoleForAudit>>false</useRoleForAudit>
    </User>
    <ihiNumber>8003604570901339</ihiNumber>
    <productType>
      <vendor>NEHTA</vendor>
      <productName>Test Harness</productName>
      <productVersion>1.0</productVersion>
      <platform>Windows 7</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
      <organisationID>8003624166667177</organisationID>
      <organisationName>Goodhope Hospital</organisationName>
    </accessingOrganisation>
  </h:PCEHRHeader>
  <h:signature
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
    <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
```

```

        <SignedInfo>
          <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
          <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-
sha1"/>
          <Reference URI="#body-f370839e-665b-4f48-be60-6779682eb224">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
              <DigestValue>a+kz3oxnTvy5/ugOwevTc+/RkDk=</DigestValue>
            </Reference>
          <Reference URI="#header-9db57655-08ed-413b-b4bd-8acb4bff8033">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
              <DigestValue>/wXS07ICfLRJKxpO3JLJIGDi/gw=</DigestValue>
            </Reference>
          <Reference URI="#timestamp-70665d67-8b49-4013-8cf9-35c9e411c14b">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
              <DigestValue>5DkOqOQ0WkMmnefxBVJSDlkTcTI=</DigestValue>
            </Reference>
        </SignedInfo>
        <SignatureValue>mWRTPgdKe.....uIUPUg==</SignatureValue>
        <KeyInfo>
          <X509Data>
            <X509Certificate>MIIFlDCC.....xVC8S0EgAw==</X509Certificate>
          </X509Data>
        </KeyInfo>
      </Signature>
    </h:signature>
    <h:timestamp
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
      xml:id="timestamp-70665d67-8b49-4013-8cf9-35c9e411c14b">
        <created>2013-04-05T05:54:28.2118342Z</created>
      </h:timestamp>
    <a:MessageID>urn:uuid:e0aaa374-2377-4110-9dcb-7098b1221f27</a:MessageID>
    <a:ReplyTo>
      <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:ReplyTo>
    <a:From>
      <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:From>
    <a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
  </s:Header>
  <s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xml:id="body-f370839e-665b-4f48-be60-6779682eb224">
    <ProvideAndRegisterDocumentSetRequest xmlns="urn:ihe:iti:xds-b:2007">
      <SubmitObjectsRequest xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:lcm:3.0">
        <RegistryObjectList xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:rsm:3.0">
          <ExtrinsicObject id="DOCUMENT_SYMBOLICID_01"
status="urn:oasis:names:tc:ebxml-regrep:StatusType:Approved"
objectType="urn:uuid:7edca82f-054d-47f2-a032-9b2a5b5186c1"
mimeType="application/zip">
            <Slot name="creationTime">
              <ValueList>
                <Value>20121224</Value>
              </ValueList>
          </ExtrinsicObject>
        </RegistryObjectList>
      </SubmitObjectsRequest>
    </ProvideAndRegisterDocumentSetRequest>
  </s:Body>

```

```

</Slot>
<Slot name="languageCode">
  <ValueList>
    <Value>en-AU</Value>
  </ValueList>
</Slot>
<Slot name="serviceStartTime">
  <ValueList>
    <Value>201212291033</Value>
  </ValueList>
</Slot>
<Slot name="serviceStopTime">
  <ValueList>
    <Value>201212291208</Value>
  </ValueList>
</Slot>
<Slot name="sourcePatientId">
  <ValueList>
<Value>8003604570901339^^^&1.2.36.1.2001.1003.0&ISO</Value>
  </ValueList>
</Slot>
<Name>
  <LocalizedString value="Discharge Summary"/>
</Name>
<Classification id="c101"
  classificationScheme="urn:uuid:93606bcf-9494-43ec-9b4e-
a7748d1a838d"
  classifiedObject="DOCUMENT_SYMBOLICID_01"
nodeRepresentation="">
  <Slot name="authorInstitution">
    <ValueList>
      <Value>Goodhope
Hospital^^^^^^^^^1.2.36.1.2001.1003.0.8003624166667177</Value>
    </ValueList>
  </Slot>
  <Slot name="authorPerson">
    <ValueList>
<Value>^Button^Henry^^^^^^&1.2.36.1.2001.1003.0.8003618334357646&ISO</Value>
    </ValueList>
  </Slot>
  <Slot name="authorSpecialty">
    <ValueList>
      <Value>General Medical Practitioner</Value>
    </ValueList>
  </Slot>
</Classification>
<Classification id="c102"
  objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:Classification"
  classificationScheme="urn:uuid:41a5887f-8865-4c09-adf7-
e362475b143a"
  classifiedObject="DOCUMENT_SYMBOLICID_01"
nodeRepresentation="18842-5">
  <Slot name="codingScheme">
    <ValueList>
      <Value>LOINC</Value>
    </ValueList>
  </Slot>
  <Name>
    <LocalizedString value="Discharge Summarization Note"/>
  </Name>
</Classification>
<Classification id="c103"
  objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:Classification"
  classificationScheme="urn:uuid:f4f85eac-e6cb-4883-b524-
f2705394840f"
  classifiedObject="DOCUMENT_SYMBOLICID_01"
nodeRepresentation="GENERAL">

```



```

        <Slot name="codingScheme">
          <ValueList>
            <Value>PCEHR_DocAccessLevels</Value>
          </ValueList>
        </Slot>
        <Name>
          <LocalizedString value="NA"/>
        </Name>
      </Classification>
      <Classification id="c104"
        regrep:ObjectType:RegistryObject:Classification"
        classificationScheme="urn:uuid:a09d5840-386c-46f2-b5ad-
6c3699a4309d"
        classifiedObject="DOCUMENT_SYMBOLICID_01"
        nodeRepresentation="1.2.36.1.2001.1006.1.20000.11">
        <Slot name="codingScheme">
          <ValueList>
            <Value>PCEHR_FormatCodes</Value>
          </ValueList>
        </Slot>
        <Name>
          <LocalizedString value="eDS"/>
        </Name>
      </Classification>
      <Classification id="c105"
        regrep:ObjectType:RegistryObject:Classification"
        classificationScheme="urn:uuid:f33fb8ac-18af-42cc-ae0e-
ed0b0bdb91e1"
        nodeRepresentation="8401">
        <Slot name="codingScheme">
          <ValueList>
            <Value>ANZSIC</Value>
          </ValueList>
        </Slot>
        <Name>
          <LocalizedString value="Hospitals (except Psychiatric
Hospitals)"/>
        </Name>
      </Classification>
      <Classification id="c106"
        regrep:ObjectType:RegistryObject:Classification"
        classificationScheme="urn:uuid:cccf5598-8b07-4b77-a05e-
ae952c785ead"
        nodeRepresentation="8401-6">
        <Slot name="codingScheme">
          <ValueList>
            <Value>ANZSIC</Value>
          </ValueList>
        </Slot>
        <Name>
          <LocalizedString
            value="Hospital (except psychiatric or veterinary
hospitals)"/>
        </Name>
      </Classification>
      <Classification id="c107"
        regrep:ObjectType:RegistryObject:Classification"
        classificationScheme="urn:uuid:f0306f51-975f-434e-a61c-
c59651d33983"
        nodeRepresentation="18842-5">
        <Slot name="codingScheme">
          <ValueList>
            <Value>LOINC</Value>
          </ValueList>
        </Slot>

```

```

        <Name>
          <LocalizedString value="Discharge Summarization Note"/>
        </Name>
      </Classification>
      <ExternalIdentifier id="ei01"
        objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:ExternalIdentifier"
        registryObject="DOCUMENT_SYMBOLICID_01"
        identificationScheme="urn:uuid:58a6f841-87b3-4a3e-92fd-
a8ffeff98427"
        value="8003604570901339^^^&1.2.36.1.2001.1003.0&ISO">
        <Name>
          <LocalizedString value="XSDDocumentEntry.patientId"/>
        </Name>
      </ExternalIdentifier>
      <ExternalIdentifier id="ei02"
        objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:ExternalIdentifier"
        registryObject="DOCUMENT_SYMBOLICID_01"
        identificationScheme="urn:uuid:2e82c1f6-a085-4c72-9da3-
8640a32e42ab"
        value="2.25.165474628040051552822629739435042771697">
        <Name>
          <LocalizedString value="XSDDocumentEntry.uniqueId"/>
        </Name>
      </ExternalIdentifier>
    </ExtrinsicObject>
    <RegistryPackage id="SUBSET_SYMBOLICID_01"
      objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:RegistryPackage">
      <Slot name="submissionTime">
        <ValueList>
          <Value>20130405155428</Value>
        </ValueList>
      </Slot>
      <Classification id="c108"
        classificationScheme="urn:uuid:a7058bb9-b4e4-4307-ba5b-
e3f0ab85e12d"
        classifiedObject="SUBSET_SYMBOLICID_01"
        nodeRepresentation="">
        <Slot name="authorInstitution">
          <ValueList>
            <Value>Goodhope
Hospital^^^^^^^^^^1.2.36.1.2001.1003.0.8003624166667177</Value>
          </ValueList>
        </Slot>
        <Slot name="authorPerson">
          <ValueList>
            <Value>^Button^Henry^^^^^^&1.2.36.1.2001.1003.0.8003618334357646&ISO</Value>
          </ValueList>
        </Slot>
        <Slot name="authorSpecialty">
          <ValueList>
            <Value>General Medical Practitioner</Value>
          </ValueList>
        </Slot>
      </Classification>
      <Classification id="c109"
        objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:Classification"
        classificationScheme="urn:uuid:aa543740-bdda-424e-8c96-
df4873be8500"
        classifiedObject="SUBSET_SYMBOLICID_01"
        nodeRepresentation="18842-5">
        <Slot name="codingScheme">
          <ValueList>
            <Value>LOINC</Value>
          </ValueList>
        </Slot>
      </Name>

```

```

        <LocalizedString value="Discharge Summarization Note"/>
    </Name>
</Classification>
<ExternalIdentifier id="ei03"
    objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:ExternalIdentifier"
    registryObject="SUBSET_SYMBOLICID_01"
    identificationScheme="urn:uuid:96fdda7c-d067-4183-912e-
bf5ee74998a8"
    value="2.25.165474628040051552822629739435042771697">
    <Name>
        <LocalizedString value="XDSSubmissionSet.uniqueId"/>
    </Name>
</ExternalIdentifier>
<ExternalIdentifier id="ei04"
    objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:ExternalIdentifier"
    registryObject="SUBSET_SYMBOLICID_01"
    identificationScheme="urn:uuid:554ac39e-e3fe-47fe-b233-
965d2a147832"
    value="1.2.36.1.2001.1003.0.8003624166667177">
    <Name>
        <LocalizedString value="XDSSubmissionSet.sourceId"/>
    </Name>
</ExternalIdentifier>
<ExternalIdentifier id="ei05"
    objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:ExternalIdentifier"
    registryObject="SUBSET_SYMBOLICID_01"
    identificationScheme="urn:uuid:6b5aea1a-874d-4603-a4bc-
96a0a7b38446"
    value="8003604570901339^^^&1.2.36.1.2001.1003.0&ISO">
    <Name>
        <LocalizedString value="XDSSubmissionSet.patientId"/>
    </Name>
</ExternalIdentifier>
</RegistryPackage>
<Classification id="c110"
    objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:Classification"
    classifiedObject="SUBSET_SYMBOLICID_01"
    classificationNode="urn:uuid:a54d6aa5-d40d-43f9-88c5-
b4633d873bdd"/>
    <Association id="as01"
    objectType="urn:oasis:names:tc:ebxml-
regrep:ObjectType:RegistryObject:Association"
    associationType="urn:oasis:names:tc:ebxml-
regrep:AssociationType:HasMember"
    sourceObject="SUBSET_SYMBOLICID_01"
    targetObject="DOCUMENT_SYMBOLICID_01">
        <Slot name="SubmissionSetStatus">
            <ValueList>
                <Value>Original</Value>
            </ValueList>
        </Slot>
    </Association>
</RegistryObjectList>
</SubmitObjectsRequest>
<Document id="DOCUMENT_SYMBOLICID_01"
    >UEsDBBQAAAAAAM5+h.....sBAAD2KAAAAAA=</Document>
</ProvideAndRegisterDocumentSetRequest>
</s:Body>
</s:Envelope>

```

For an example of a document being **amended** with a ProvideAndRegisterDocumentRequest, see Appendix [D.1.1](#).

## 7.2.1.2 Response

**Name of Response:** RegistryResponse

**RegistryResponse**

See ITI-41 Provide & Register Document Set – b section of the PCEHR Document Exchange Service Using the IHE XDS.b Platform [DEX TSS]

The outputs are as shown in Table 14.

Table 14: RegistryResponse message elements

Level 1 Element	Level 2 Element	Card	Explanation
Registry Response		1..1	Possible values urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Success urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Failure
Registry ErrorList		0..*	
	RegistryError	1..1	Attributes: codeContext: PCEHR_ERROR_XXXX – [Description] errorCode:XDSRepositoryError, XDSRegistryError or ATS5820 errorCodes severity: error, warning or error and warning location: location of the error

**Example – Successful** (where most instances of the SignatureValue and X509Certificate have been replaced with “.....”)

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>urn:ihe:iti:2007:ProvideAndRegisterDocumentSet-bResponse</wsa:Action>
    <wsa:MessageID>urn:uuid:3113b37a-7432-49f2-aa16-158c3583dc36</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:e0aaa374-2377-4110-9dcb-7098b1221f27</wsa:RelatesTo>
    <ns:signature
xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
      <dsig:Signature xmlns:dsig="http://www.w3.org/2000/09/xmldsig#"
        Id="Id-0001365141134058-5ba00aa5515e668e0ef90000-4">
        <dsig:SignedInfo>
          <dsig:CanonicalizationMethod
Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
          <dsig:SignatureMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-sha1" />
          <dsig:Reference URI="#Id-0001365141134058-5ba00aa5515e668e0ef90000-3">
            <dsig:Transforms>
              <dsig:Transform Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
            </dsig:Transforms>
            <dsig:DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
            <dsig:DigestValue>adYYNHdU4Lduq8e6PpnJyc2rWpE=</dsig:DigestValue>
          </dsig:Reference>
        </dsig:SignedInfo>
        <dsig:SignatureValue>hNDIB2v.....tD6AiA==</dsig:SignatureValue>
        <dsig:KeyInfo Id="Id-0001365141134058-5ba00aa5515e668e0ef90000-5">
          <dsig:X509Data>
<dsig:X509Certificate>MIIFfz.....gNAWLwRIug==</dsig:X509Certificate>
          </dsig:X509Data>
        </dsig:KeyInfo>
        </dsig:Signature>
      </ns:signature>
```

```

</soap:Header>
<soap:Body xmlns:wsa="http://www.w3.org/2005/08/addressing"
  xml:id="Id-0001365141134058-5ba00aa5515e668e0ef90000-3">
  <rs:RegistryResponse xmlns:rs="urn:oasis:names:tc:ebxml-regrep:xsd:rs:3.0"
    xmlns:env="http://www.w3.org/2003/05/soap-envelope"
    status="urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Success"/>
</soap:Body>
</soap:Envelope>

```

### Example – Error

```

<?xml version="1.0" encoding="utf 8"?>
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>urn:ihe:iti:2007:ProvideAndRegisterDocumentSet bResponse</wsa:Action>
    <wsa:MessageID>urn:uuid:aaa8a645 610d 4299 9e04 e03b1364c619</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:fabb2d3a ba07 4dd7 8b7a ce82ba1b2ab9</wsa:RelatesTo>
    <ns:signature>...</ns:signature>
  </soap:Header>
  <soap:Body xml:id="Id 0001337512612316 2ecac1224fb8d2a43a790000 2">
    <urn:RegistryResponse xmlns:urn="urn:oasis:names:tc:ebxml regrep:xsd:rs:3.0" status="
urn:oasis:names:tc:ebxml regrep:ResponseStatusType:Failure">
      <urn:RegistryErrorList highestSeverity="urn:oasis:names:tc:ebxml regrep:ErrorSeveri
tyType:Error">
        <urn:RegistryError codeContext="PCEHR_ERROR_3001 Invalid document folder struct
ure" errorCode="XDSRepositoryError" severity="urn:oasis:names:tc:ebxml regrep:ErrorSeveri
tyType:Error" location="PCEHR Interface"/>
      </urn:RegistryErrorList>
    </urn:RegistryResponse>
  </soap:Body>
</soap:Envelope>

```

### Web Service Errors

See [Appendix E](#).

### Functional Errors

Table 15: Functional errors for RegistryResponse

errorCode	contextCode	Explanation
PCEHR_ERROR_3001	Invalid document folder structure	Document structure is not per XDS Packaging Specification, please refer to section <a href="#">3.4</a>
XDSRepositoryError	PCEHR_ERROR_3002 - Document metadata failed validation	Error in validating information PCEHR Header, XDS Metadata and CDA document.
PCEHR_ERROR_3003	No metadata found	XDS Metadata is not found
PCEHR_ERROR_3004	Invalid clinical document	Invalid CDA Document
PCEHR_ERROR_3005	Document validation returned with errors and warnings. Details: <![CDATA..%Validate Templates Response%]>	Template validation error and warning
XDSRepositoryError	PCEHR_ERROR_3006 -Document validation returned with errors. Details: <![CDATA..%Validate Templates Response%]>	Template validation error
XDSRepositoryError	PCEHR_ERROR_3007 -Document validation returned warnings. Details: <![CDATA..%Validate Templates Response%]>	Template validation warning
XDSRepositoryError	PCEHR_ERROR_3008 -Invalid template ID for PCEHR	Invalid Format Code

## 7.3 ITI-43 Retrieve Document Set

The PCEHR System uses ITI-43 Retrieve Document Set to allow a client system to retrieve a document from the PCEHR System.

### 7.3.1 RetrieveDocumentSetRequest

#### 7.3.1.1 Request

**Name of Request:** RetrieveDocumentSetRequest

PCEHRHeader (see section 4.4)

#### RetrieveDocumentSetRequest

See ITI-43 Retrieve Document Set section of the PCEHR Document Exchange Service Using the IHE XDS.b Platform [[DEX TSS](#)].

Table 16: RetrieveDocumentSetRequest message elements

Level 1 Element	Level 2 Element	Card	Explanation
RetrieveDocumentSetRequest		1..1	
	DocumentRequest	1..1	See <i>DocumentRequest</i>

Table 17: the DocumentRequest sub-elements

Level 1 Element	Level 2 Element	Card	Explanation
DocumentRequest		1..1	
	RepositoryUniqueId	1..1	OID of the document's repository
	DocumentUniqueId	1..1	XSDDocumentEntry.uniqueID of document. This will be an OID.

### Coding Tips

When populating the PCEHR Header, the *PCEHRHeader.ihNumber* **SHALL** be the IHI number of the patient of the given *DocumentUniqueId*. Otherwise the PCEHR System will return, "PCEHR\_ERROR\_3002 - Document metadata failed validation" as the PCEHR System will validate the CDA Document patientId with the *PCEHRHeader.ihNumber*.

### Example

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">urn:ihe:iti:2007:RetrieveDocumentSet</Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-90ba0538-4052-4c65-9fe7-c09bca29505f">
      <User>
        <IDType>HPID</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <ihNumber>8003608833337025</ihNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
    </h:PCEHRHeader>
  </s:Header>
  <s:Body>
    <DocumentRequest>
      <RepositoryUniqueId>
      <DocumentUniqueId>
    </DocumentRequest>
  </s:Body>
</s:Envelope>
```

```

</productType>
<clientSystemType>CIS</clientSystemType>
<accessingOrganisation>
  <organisationID>8003626566674315</organisationID>
  <organisationName>Local Practice</organisationName>
</accessingOrganisation>
</h:PCEHRHeader>
<h:signature .....>
.....
</h:signature>
.....
<MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:403d501b-7cd9-4116-b
1f1-c8016d4b7eee</MessageID>
.....
</s:Header>
<s:Body xml:id="body-ac285b42-af85-4135-9703-550731928093">
  <RetrieveDocumentSetRequest xmlns="urn:ihe:iti:xds-b:2007">
    <DocumentRequest>
      <RepositoryUniqueId>1.2.36.1.2001.1006.0.1.3.1</RepositoryUniqueId>
      <DocumentUniqueId>2.25.172688582738891283173538910007322793319</DocumentUniqueId>
    </DocumentRequest>
  </RetrieveDocumentSetRequest>
</s:Body>
</s:Envelope>

```

### 7.3.1.2 Response

**Response Name:** RetrieveDocumentSetResponse

Table 18: RetrieveDocumentSetResponse message elements

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
RetrieveDocumentSetResponse			1..1	
	status		1..1	Possible values: urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Success urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Failure
	DocumentResponse		1..1	XDSDocumentEntry.uniqueID of document. This will be an OID.
		RepositoryUniqueId	1..1	Repository Unique Id
		DocumentUniqueId	1..1	Document Unique Id
		contentType	1..1	Application/zip If representing the CDA package in the XDM-ZIP representation, this value will always be "CDA_ROOT.XML".
		Document	1..1	Base64 representation of the CDA Package

#### Example

A sample RetrieveDocumentSetResponse is shown below. The entire message is a MTOM response: the first part is the XML component of the message; and the second part is the CDA package of the document, in octet-stream encoding (which has been omitted).

```

--MIME_Boundary
Content-ID: <a2767d6b9ec947febcb2d9875cb5b4aa>
Content-Type: application/xop+xml; type="application/soap+xml";
  charset=utf-8
Content-Transfer-Encoding: 8bit

```

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>urn:ihe:iti:2007:RetrieveDocumentSetResponse</wsa:Action>
    <wsa:MessageID>urn:uuid:d73bce31-5371-4e87-9067-20a5bf72cffb</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:403d501b-7cd9-4116-b1f1-c8016d4b7eee</wsa:RelatesTo>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <env:Body xmlns:ns2="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0" xmlns:ns1="urn:oasis:names:tc:ebxml-regrep:xsd:rs:3.0" xmlns:ns0="urn:ihe:iti:xds-b:2007" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xmlns:env="http://www.w3.org/2003/05/soap-envelope" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xml:id="Id-0001339721074600-307edd274fda85725c090000-2">
    <ns0:RetrieveDocumentSetResponse>
      <ns1:RegistryResponse status="urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Success"/>
      <ns0:DocumentResponse>
        <ns0:RepositoryUniqueId>1.2.36.1.2001.1006.0.1.3.1</ns0:RepositoryUniqueId>
        <ns0:DocumentUniqueId>2.25.172688582738891283173538910007322793319</ns0:DocumentUniqueId>
        <ns0:mimeType>application/zip</ns0:mimeType>
        <ns0:Document>
          <inc:Include xmlns:inc="http://www.w3.org/2004/08/xop/include" href="cid:a7c55031c59c4b2fa338939efa8c702b"/>
        </ns0:Document>
      </ns0:DocumentResponse>
    </ns0:RetrieveDocumentSetResponse>
  </env:Body>
</soap:Envelope>

--MIME_Boundary
Content-Type: application/octet-stream
Content-Transfer-Encoding: binary
Content-Id: <a7c55031c59c4b2fa338939efa8c702b>
.....Binary of CDA package.....
--MIME_Boundary-

```

## Functional Errors

Table 19: RetrieveDocumentSetResponse message functional errors

errorCode	contextCode	Explanation
XDSRepositoryError	PCEHR_ERROR_3002 - Document metadata failed validation	Error in validating information PCEHR Header, XDS Metadata and CDA document.
XDSRepositoryError	PCEHR_ERROR_3501 - No metadata found	XDS Metadata for a given document Id is not found
XDSRepositoryError	PCEHR_ERROR_3502 - Insufficient privileges to view the document	Access Denied
XDSRepositoryError	PCEHR_ERROR_3503 - Removed document not retrievable from PCEHR	Document has been removed

**Web Service Errors:** see [Appendix E](#).

## 7.4 ITI-18 Registry Stored Query

The PCEHR System uses ITI-43 Retrieve Document Set to allow a client system to find a document and get an index view from the PCEHR System.



## 7.4.1 AdHocQueryRequest

### 7.4.1.1 Request

**Logical Set:** findDocuments

**Name of Request:** AdhocQueryRequest

PCEHRHeader (see section 4.4).

#### AdhocQueryRequest

SeeITI-18 Registry Stored Query section of the PCEHR Document Exchange Service Using the IHE XDS.b Platform [DEX TSS].

Table 20: AdhocQueryRequest message inputs

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
AdhocQueryRequest			1..1	
	ResponseOption		1..1	
		returnType	1..1	Value is LeafClass
	AdhocQuery		1..1	Query Object, see section Appendix B for supported query type and their Ids
		Slots	1..*	Query parameter, see IHE XDS Spec 2a (Rev 8) for the supported query parameter. These parameters can be used to help restrict the types of registered documents returned.

#### Coding Tips

When populating the PCEHR Header, the `PCEHRHeader.ihNumber` **SHALL** be the IHI number of the patient of the given `DocumentUniqueId` or the same IHI number value as `XDSDocumentEntryPatientId` when provided. Otherwise the PCEHR System will return, "PCEHR\_ERROR\_3002 - Document metadata failed validation" as the PCEHR System will validate the CDA Document `patientId` with the `PCEHRHeader.ihNumber`.

### 7.4.1.1 Query Types

#### Find Documents (using the AdhocQueryRequest)

Query Id: **urn:uid:14d4debf-8f97-4251-9a74-a90016b0af0d**

Usage: This is used to find documents in the PCEHR Document Registry.

Table 21: Find Documents request parameters

Field	Data Type	Explanation	Cardinality	Wildcards allowed
<code>\$XDSDocumentEntryPatientId</code>	String	The IHI number that is within the document that was submitted to the PCEHR System	1..1	N/A
<code>\$XDSSubmissionSetSubmissionTimeFrom</code>	UTC date	The date and time that the document was submitted to the PCEHR System. If this parameter is supplied, the query will only return documents submitted on or after this time.	0..1	No

Field	Data Type	Explanation	Cardinality	Wildcards allowed
\$XDSDocumentEntryClassCode	String	A code relating to the type of document being searched for. If this parameter is supplied, the query will only return documents which were asserted as being of this type when submitted.	0..*	No
\$XDSDocumentEntryFormatCode	OID	The identifier of the template this document conforms to. If this parameter is supplied, the query will only return documents which were asserted as conforming to this Template ID when submitted.	0..*	No
\$XDSDocumentEntryCreationTimeFrom	UTC date	The UTC datetime that the document was created. If this parameter is supplied, the query will only return documents created on or after this time.	0..1	No
\$XDSDocumentEntryStatus	String	This Document Status. This <b>SHALL</b> be set to ('urn:oasis:names:tc:ebxml-regrep:StatusType:Deprecated' )	1..*	No
\$XDSDocumentEntryAuthorPerson	String	This may be a local CIS user ID or a HPI-I or PCEHR System Operator User Id. If this parameter is supplied the query will only return documents which were associated with this HPI-I or user identifier on submission	0..1	No
\$XDSDocumentEntryHealthcareFacilityTypeCode	String	A code identifying the clinical specialty where the event relating to this document submission request initiated. If this parameter is supplied the query will only return documents which were associated with this Clinical Specialty Type on submission	0..1	No

For an example of a FindDocuments query and response, see Appendix [D.2.1](#).

### Get Documents (using the AdhocQueryRequest)

Query Id: **urn:uuid:5c4f972b-d56b-40ac-a5fcc8ca9b40b9d4**

Usage: This is used to get a single document registry information. This can be used to facilitate the replace document operation where the latest registry object Unique Id is needed. The other method to replace a document is with a single ITI-41 Provide and Register Document Set-b operation, providing the original TargetObject.

Table 22: Get Documents request parameters

Field	Data Type	Explanation	Cardinality	Wildcards allowed
\$XDSDocumentEntryUniqueId	String	The Document ID that was submitted to the PCEHR System	1..1	N/A

#### 7.4.1.2 Response

**Name of Response:** AdhocQueryResponse

## Output

Table 23: *adhocQueryResponse* message elements

Level 1 Element	Level 2 Element	Card	Explanation
AdhocQueryResponse		1..1	Status urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Success urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Failure
	RegistryObjectList	1..*	List of Document Metadata, see RegistryObjectList in section 7.2.1

## Functional Errors

Table 24: *AdhocQueryResponse* functional errors

errorCode	contextCode	Explanation
XDSRepositoryError	PCEHR_ERROR_3002 - Document metadata failed validation	Error in validating information PCEHR Header, XDS Metadata and CDA document.

**Web Service Errors:** see [Appendix E](#).

## 7.5 removeDocument

PCEHR System's bespoke web service removeDocument logically deletes documents from the PCEHR System.

### 7.5.1 Request

**Request Name:** removeDocument

PCEHRHeader (see section 4.4).

#### removeDocument

See section 4.1.7 of the *PCEHR Document Exchange Service Using the IHE XDS.b Platform* [DEX TSS]

Table 25: *removeDocument* inputs

Level 1 Element	Level 2 Element	Card	Explanation
RemoveDocument		1..1	
	DocumentId	1..1	Document Unique Id
	RemovalReason	1..1	Only 'Withdrawn' and 'IncorrectIdentity' is allowed for CIS and CSP

## Coding Tips

The full conformance points of the request are given in sections 3.3.4.1 and 3.3.4.2 of the *PCEHR Document Exchange Service Using the IHE XDS.b Platform* [DEX TSS].

Only the author of the document is allowed to remove a document. The PCEHR System will validate the *PCEHRHeader.AccessingOrganisation.ID* with the authorInstitution of a given document uniqueId.

### Example

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/pcehr/svc/RemoveDocument/1.1/RemoveDocumentPortType/removeDocumentRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-96221987-df7d-49ae-ab81-65e3f591b54b">
      <User>
        <IDType>HPII</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>>false</useRoleForAudit>
      </User>
      <ihiNumber>8003608833337025</ihiNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003626566674315</organisationID>
        <organisationName>Local Practice</organisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature .....>
      .....
    </h:signature>
    .....
    <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:d29ee08a-a869-4141-9d45-29271d0d15ad</MessageID>
    .....
  </s:Header>
  <s:Body xml:id="body-412b274e-55d2-4e4a-8e3d-435d1f06e3de">
    <removeDocument xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/RemoveDocument/1.0">
      <documentID>2.25.172688582738891283173538910007322793319</documentID>
      <reasonForRemoval>Withdrawn</reasonForRemoval>
    </removeDocument>
  </s:Body>
</s:Envelope>
```

## 7.5.2 Response

**Name of Response:** removeDocumentResponse

### Outputs

Table 26: RemoveDocumentResponse elements

Level 1 Element	Level 2 Element	Level 3 Elements	Card	Explanation
RemoveDocumentResponse			1..1	
	ResponseStatus		1..1	Success or failure
		Code	1..1	PCEHR_SUCCESS or PCEHR_ERROR_XXXX
		Description	1..1	Success or [Error Message]
		Details	0..*	

### Example Success

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>
      http://ns.electronichealth.net.au/pcehr/svc/RemoveDocument/1.1/RemoveDocumentPortType/RemoveDocumentResponse
    </wsa:Action>
    <wsa:MessageID>urn:uuid:cb870c3b-8681-42db-a393-670857c5f105</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:d29ee08a-a869-4141-9d45-29271d0d15ad</wsa:RelatesTo>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <S:Body xmlns:S="http://www.w3.org/2003/05/soap-envelope" xml:id="Id-0001339721276890-0419c3924fda863c01790000-2">
    <ns:removeDocumentResponse xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/RemoveDocument/1.0">
      <ns:responseStatus>
        <ns1:code xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">PCEHR_SUCCESS</ns1:code>
        <ns1:description xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">Document is Successfully Removed</ns1:description>
        <ns1:details xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"/>
      </ns:responseStatus>
    </ns:removeDocumentResponse>
  </S:Body>
</soap:Envelope>
```

### Functional Errors

Table 27: RemoveDocumentresponse functional errors

Code	Description	Explanation
PCEHR_ERROR_3002	Document metadata failed validation	Error in validating information PCEHR Header, XDS Metadata and CDA document., i.e. PCEHRHeader.ihNumber is not the same with the patientId of a given documentId.
PCEHR_ERROR_2501	Document not found	Cannot find the given document unique Id.

**Web Service Errors:** see [Appendix E](#).

### Example Error

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>
      http://ns.electronichealth.net.au/pcehr/svc/RemoveDocument/1.1/RemoveDocumentPortType/RemoveDocumentResponse
    </wsa:Action>
    <wsa:MessageID>urn:uuid:4b546516 e855 4195 9724 32c58968684b</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:85c74599 3a03 402e ad6f a6f7f009acde</wsa:RelatesTo>
    .....
  </soap:Header>
  <S:Body xmlns:S="http://www.w3.org/2003/05/soap envelope" xml:id="Id 0001336700792591 a7e0692d4fac6f782d19e4fc 2">
    <ns1:removeDocumentResponse xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/RemoveDocument/1.0">
      <ns1:responseStatus>
        <ns2:code xmlns:ns2="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">PCEHR_ERROR_2501</ns2:code>
        <ns2:description xmlns:ns2="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">Document not found</ns2:description>
      </ns1:responseStatus>
    </ns1:removeDocumentResponse>
  </S:Body>
</soap:Envelope>
```

## 8 View Service

### 8.1 Overview

The View Service provides a mechanism for conformant external systems to retrieve a series of predefined views for an individual's PCEHR. Upon request, the PCEHR System supplies a collection of related data, specific to a consumer and the requestor's access permissions.

### 8.2 getView

The getView operation is responsible for returning the constructed representation of predefined views from the PCEHR System.

The type of view retrieved will depend on the view request parameters. The XSD has a weakly typed schema. The PCEHR system will automatically determine which view is requested, when parsing the XML request message.

The data extracted for the view from clinical documents is dependent on the requestor's access rights.

#### 8.2.1 Request

**Request Name:** getView

##### Inputs

PCEHRHeader (see section 4.4).

The `ihiNumber` and the `accessingOrganisation.organisationID` must be set in the PCEHR Header.

##### getView

See getView section under Service Realisation section of the PCEHR View Service Technical Services Specification. [[VIEW TSS](#)]

Table 28: getView inputs

getView Elements	Explanation
View	Each view will have different choice parameters. The getView web service will determine which type of view it is based on these. These parameters are of type xs:any.

#### 8.2.1.1 getView prescriptionAndDispenseView request example

The request choice parameters for the Prescription and Dispense View are given below.

Table 29: Request choice parameters for the Prescription and Dispense View

getView PrescriptionAndDispenseView parameters	Explanation
versionNumber	The schema namespace version number for the PrescriptionAndDispenseView
fromDate	Start date of the service event. Sample: 2010-04-24
toDate	End date of the service event. Sample: 2012-04-24

In this request, when the IHI number is quoted, the accessing organisation has access to at least some of the PCEHR and the client system type is a clinical information system.

### Example

Request message (where most of the instances of SignatureValue and X509Certificate have been replaced with "....."):

```
<s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <a:Action s:mustUnderstand="1"
>http://ns.electronichealth.net.au/pcehr/svc/GetView/1.0/GetViewPortType/getViewRequest</
a:Action>
    <h:PCEHRHeader
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xml:id="header-df9070a4-7309-4f9d-88ac-419585d3a77e">
    <User>
      <IDType>HPPI</IDType>
      <ID>pwilford</ID>
      <username>JoeBloggs</username>
      <useRoleForAudit>>false</useRoleForAudit>
    </User>
    <ihiNumber>8003602345689155</ihiNumber>
    <productType>
      <vendor>NEHTA</vendor>
      <productName>Test Harness</productName>
      <productVersion>1.0</productVersion>
      <platform>Windows 7</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
      <organisationID>8003624166667177</organisationID>
      <organisationName>Medicare-305</organisationName>
    </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
      <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
        <SignedInfo>
          <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
          <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-
sha1" />
          <Reference URI="#body-552151e3-16ee-4195-94a2-8a8357f058ee">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>zPJLcyq4Xcw+0Pm2CRKeHMFTU/o=</DigestValue>
            </Reference>
          <Reference URI="#header-df9070a4-7309-4f9d-88ac-419585d3a77e">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>8Z1SRwDWxKf5DG3CD+KHcwQnSP8=</DigestValue>
            </Reference>
          <Reference URI="#timestamp-4f6586ea-9b7c-4392-a750-1664c1a7d571">
```

```

        <Transforms>
            <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
        </Transforms>
        <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
        <DigestValue>NK3W5+vWohitJZy4fCp7/Xik/IM=</DigestValue>
        </Reference>
    </SignedInfo>
    <SignatureValue>HbvNKob2...../VQ==</SignatureValue>
    <KeyInfo>
        <X509Data>
            <X509Certificate>MIIFlDCCBHygAwIB.....8S0EgAw==</X509Certificate>
        </X509Data>
    </KeyInfo>
</Signature>
</h:signature>
<h:timestamp

xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xml:id="timestamp-4f6586ea-9b7c-4392-a750-1664c1a7d571">
        <created>2013-03-22T05:24:35.088928Z</created>
    </h:timestamp>
    <a:MessageID>urn:uuid:cc030c08-c5a2-4a49-8d9d-6ebde4936801</a:MessageID>
    <a:ReplyTo>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:ReplyTo>
    <a:From>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:From>
    <a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:xsd="http://www.w3.org/2001/XMLSchema"
    xml:id="body-552151e3-16ee-4195-94a2-8a8357f058ee">
    <getView
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetView/1.0">
        <view

xmlns:q1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/PrescriptionAndDispenseV
iew/1.0"
            " xsi:type="q1:prescriptionAndDispenseView">
                <q1:versionNumber>1.0</q1:versionNumber>
                <q1:fromDate>2012-09-03</q1:fromDate>
                <q1:toDate>2013-03-22</q1:toDate>
            </view>
        </getView>
    </s:Body>
</s:Envelope>

```

### 8.2.1.2 getView medicareOverview request example

The request choice parameters for the Medicare Overview View are given below.

Table 30: Request choice parameters for the Medicare Overview View

getView medicareOverview parameters	Explanation
versionNumber	The schema namespace version number for the Medicare Overview
fromDate	Start date of the MBS/PBS service event. Sample: 2010-04-24
toDate	End date of the MPS/PBS service event. Sample: 2012-04-24



In this request, when the IHI number is quoted, the accessing organisation has access to at least some of the PCEHR and the client system type is a clinical information system.

### Example

Request message (where most of the instances of SignatureValue and X509Certificate have been replaced with "....."):

```

<s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <a:Action s:mustUnderstand="1"
>http://ns.electronichealth.net.au/pcehr/svc/GetView/1.0/GetViewPortType/getViewRequest</
a:Action>
    <h:PCEHRHeader
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xml:id="header-6416f7bf-ea3f-493c-bebf-d4e8bd4b6caa">
    <User>
      <IDType>HPPI</IDType>
      <ID>pwilford</ID>
      <username>JoeBloggs</username>
      <useRoleForAudit>>false</useRoleForAudit>
    </User>
    <ihiNumber>8003602345689155</ihiNumber>
    <productType>
      <vendor>NEHTA</vendor>
      <productName>Test Harness</productName>
      <productVersion>1.0</productVersion>
      <platform>Windows 7</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
      <organisationID>8003624166667177</organisationID>
      <organisationName>Medicare-305</organisationName>
    </accessingOrganisation>
  </h:PCEHRHeader>
  <h:signature
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
    <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
      <SignedInfo>
        <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
        <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-
sha1" />
        <Reference URI="#body-9e50d3e0-f34f-4817-aa08-bc62081ff0cb">
          <Transforms>
            <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
          </Transforms>
          <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
            <DigestValue>SvXbt4j3B8YfmSswNlkd2F6Uhzg=</DigestValue>
          </Reference>
          <Reference URI="#header-6416f7bf-ea3f-493c-bebf-d4e8bd4b6caa">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>wIBPLZ1IcA9LmI3s10nOR6RAV7c=</DigestValue>
            </Reference>
            <Reference URI="#timestamp-76a84c11-6f8e-4aa5-a7e1-19e462c77f7b">

```

```

        <Transforms>
            <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
        </Transforms>
        <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
        <DigestValue>vdXBKfhB2fKIaer35aA3vNlsouI=</DigestValue>
        </Reference>
    </SignedInfo>
    <SignatureValue>zlGMGeMaBtq.....ypA==</SignatureValue>
    <KeyInfo>
        <X509Data>
            <X509Certificate>MIIFlDCCBHyg.....8S0EgAw==</X509Certificate>
        </X509Data>
    </KeyInfo>
</Signature>
</h:signature>
<h:timestamp

xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xml:id="timestamp-76a84c11-6f8e-4aa5-a7e1-19e462c77f7b">
        <created>2013-03-22T05:23:40.419528Z</created>
    </h:timestamp>
    <a:MessageID>urn:uuid:e0c0e343-711a-49e5-8627-f76ec4bf821f</a:MessageID>
    <a:ReplyTo>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:ReplyTo>
    <a:From>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:From>
    <a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:xsd="http://www.w3.org/2001/XMLSchema"
    xml:id="body-9e50d3e0-f34f-4817-aa08-bc62081ff0cb">
    <getView
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetView/1.0">
        <view

xmlns:q1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/MedicareOverview/1.0"
            xsi:type="q1:medicareOverview">
                <q1:versionNumber>1.0</q1:versionNumber>
                <q1:fromDate>2012-12-12</q1:fromDate>
                <q1:toDate>2013-03-22</q1:toDate>
            </view>
        </getView>
    </s:Body>
</s:Envelope>

```

### 8.2.1.3 getView observationView request example

Table 31: The request choice parameters for the Observation View are given below

getView observationView parameters	Explanation
versionNumber	The schema namespace version number for the Observation View
fromDate	Start date of the observation event. Sample: 2010-04-24
toDate	End date of the observation event. Sample: 2012-04-24
observationType	The measurement observation type. Sample: HEADCIRCUMFERENCE
documentSource	The source of the observation. Sample: PROVIDER
referenceData	The organisation used for reference data. Sample: WHO

In this request, when the IHI number is quoted, the accessing organisation has access to at least some of the PCEHR and the Client System Type is a clinical information system.

### Example

Request message (where most of the instances of X509Certificate have been replaced with "....."):

```
< s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <a:Action s:mustUnderstand="1"
>http://ns.electronichealth.net.au/pcehr/svc/GetView/1.0/GetViewPortType/getViewRequest</
a:Action>
    <h:PCEHRHeader
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xml:id="header-ad3e98cb-7b01-40c2-b616-7a47af83d90c">
    <User>
      <IDType>HPPII</IDType>
      <ID>pwilford</ID>
      <username>JoeBloggs</username>
      <useRoleForAudit>>false</useRoleForAudit>
    </User>
    <ihiNumber>8003602345689155</ihiNumber>
    <productType>
      <vendor>NEHTA</vendor>
      <productName>Test Harness</productName>
      <productVersion>1.0</productVersion>
      <platform>Windows 7</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
      <organisationID>8003624166667177</organisationID>
      <organisationName>Medicare-305</organisationName>
    </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
      <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
        <SignedInfo>
          <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
          <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-
sha1" />
          <Reference URI="#body-6d9958c4-5afe-4594-82e1-09b193906d51">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>a2kE1WRCungzNdIXH04J9bH6o8s=</DigestValue>
            </Reference>
          <Reference URI="#header-ad3e98cb-7b01-40c2-b616-7a47af83d90c">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>qYSU9xykSHVkaAoBrppjQYHjcuFk=</DigestValue>
            </Reference>
          <Reference URI="#timestamp-c9255b77-7980-4f66-a4ed-5747898128ca">
```

```

        <Transforms>
            <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
        </Transforms>
        <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
        <DigestValue>2GYMaqnCjgqQEpvVeSA4bbGPWPE=</DigestValue>
        </Reference>
    </SignedInfo>
    <SignatureValue>WqrDcEr.....nGY7Q==</SignatureValue>
    <KeyInfo>
        <X509Data>
            <X509Certificate>MIIFlDCCBHyg.....C8S0EgAw==</X509Certificate>
        </X509Data>
    </KeyInfo>
</Signature>
</h:signature>
<h:timestamp

xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xml:id="timestamp-c9255b77-7980-4f66-a4ed-5747898128ca">
        <created>2013-03-22T05:24:04.555128Z</created>
    </h:timestamp>
    <a:MessageID>urn:uuid:58317360-edb4-4e4f-b74d-2964450cff48</a:MessageID>
    <a:ReplyTo>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:ReplyTo>
    <a:From>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:From>
    <a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:xsd="http://www.w3.org/2001/XMLSchema"
    xml:id="body-6d9958c4-5afe-4594-82e1-09b193906d51">
    <getView
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetView/1.0">
        <view

xmlns:q1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/ObservationView/1.0"
            xsi:type="q1:observationView">
                <q1:versionNumber>1.0</q1:versionNumber>
                <q1:fromDate>2012-12-12</q1:fromDate>
                <q1:toDate>2013-03-22</q1:toDate>
                <q1:observationType>HEADCIRCUMFERENCE</q1:observationType>
                <q1:documentSource>PROVIDER</q1:documentSource>
            </view>
        </getView>
    </s:Body>
</s:Envelope>

```

#### 8.2.1.4 getView healthCheckScheduleView request example

Table 32: Request choice parameters for Health Check Schedule View.

getView observationView parameters	Explanation
versionNumber	The schema namespace version number for the Health Check Schedule View
jurisdiction	The jurisdiction that the Health Check Schedule Applies to

In this request, when the IHI number is quoted, the accessing organisation has access to at least some of the PCEHR and the Client System Type is a clinical information system.

**Example**

Request message (where most of the X509Certificate has been replaced with "....."):

```

<s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <a:Action s:mustUnderstand="1"
    >http://ns.electronichealth.net.au/pcehr/svc/GetView/1.0/GetViewPortType/getViewRequest</
    a:Action>
    <h:PCEHRHeader
    xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:xsd="http://www.w3.org/2001/XMLSchema"
    xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xml:id="header-4e667f16-49ae-40c4-bb70-0d0b7663c231">
    <User>
      <IDType>HPPII</IDType>
      <ID>pwilford</ID>
      <username>JoeBloggs</username>
      <useRoleForAudit>>false</useRoleForAudit>
    </User>
    <ihiNumber>8003602345689155</ihiNumber>
    <productType>
      <vendor>NEHTA</vendor>
      <productName>Test Harness</productName>
      <productVersion>1.0</productVersion>
      <platform>Windows 7</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
      <organisationID>8003624166667177</organisationID>
      <organisationName>Medicare-305</organisationName>
    </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature
    xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
      <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
        <SignedInfo>
          <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
          <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-
sha1" />
          <Reference URI="#body-3c7bf1ec-5d4e-439e-b773-7a1dda2c6946">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>DpREVC4awOP2+1ZtWztlrC9Fauk=</DigestValue>
            </Reference>
          <Reference URI="#header-4e667f16-49ae-40c4-bb70-0d0b7663c231">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
            <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
              <DigestValue>wiFdD8/mIMYHZn/HLWqc+mBvpUk=</DigestValue>
            </Reference>
          <Reference URI="#timestamp-8e180160-8c18-41bb-a481-7b23f9aa41b7">
            <Transforms>
              <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            </Transforms>
          </Signature>
        </SignedInfo>
      </Signature>
    </h:signature>
  </s:Header>
  <s:Body>
  </s:Body>
</s:Envelope>

```

```

        <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
        <DigestValue>mcJxsXww9g0EioSybALiox3tOF8=</DigestValue>
    </Reference>
</SignedInfo>
<SignatureValue>ShFEZ3USIQFj.....zHSF7Eg==</SignatureValue>
<KeyInfo>
    <X509Data>
        <X509Certificate>MIIFlDCCBHyg.....8S0EgAw==</X509Certificate>
    </X509Data>
</KeyInfo>
</Signature>
</h:signature>
<h:timestamp

xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"

xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xml:id="timestamp-8e180160-8c18-41bb-a481-7b23f9aa41b7">
        <created>2013-03-22T05:22:31.329428Z</created>
    </h:timestamp>
<a:MessageID>urn:uuid:d786c8a5-3dc7-4bdb-8b50-30947449b6ac</a:MessageID>
<a:ReplyTo>
    <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
</a:ReplyTo>
<a:From>
    <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
</a:From>
<a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xml:id="body-3c7bf1ec-5d4e-439e-b773-7a1dda2c6946">
    <getView
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetView/1.0">
        <view

xmlns:q1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/HealthCheckScheduleView/
1.0"
            xsi:type="q1:healthCheckScheduleView">
                <q1:versionNumber>1.0</q1:versionNumber>
                <q1:jurisdiction>QLD</q1:jurisdiction>
            </view>
        </getView>
    </s:Body>
</s:Envelope>

```

## 8.2.2 getView Response

**Name of Response:** getViewResponse

Table 33: getViewResponse message elements

getViewResponse Elements		Explanation
PCEHRRecord	view	The record, as a CDA package, in Base64 encoding.
responseStatus	code	Generic response status codes: PCEHR_SUCCESS   PCEHR_ERROR_6501
	description	SUCCESS   View could not be generated
	details	Additional detail of the response

For details of the view data returned, refer to the corresponding Structured Content Specifications and CDA Implementation Guide documents. These include but are not limited to Prescription and Dispense View Structured Content Specification.

### 8.2.2.1 getView prescriptionAndDispenseView response example

#### Example

Successful response (where most of the SignatureValue dsig:X509Certificate and ns:data have been replaced with "....."):

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">

<wsa:Action>http://ns.electronichealth.net.au/pcehr/svc/GetView/1.0/GetViewPortType/getViewResponse</wsa:Action>
  <wsa:MessageID>urn:uuid:5b686af0-3723-4f72-a818-1a0d9ef91417</wsa:MessageID>
  <wsa:RelatesTo>urn:uuid:cc030c08-c5a2-4a49-8d9d-6ebde4936801</wsa:RelatesTo>
  <ns:signature
xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
  <dsig:Signature xmlns:dsig="http://www.w3.org/2000/09/xmldsig#"
    Id="Id-0001363929747121-b532e58c514bea930b29616c-4">
    <dsig:SignedInfo>
      <dsig:CanonicalizationMethod
Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
      <dsig:SignatureMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-sha1" />
      <dsig:Reference URI="#Id-0001363929747121-b532e58c514bea930b29616c-3">
        <dsig:Transforms>
          <dsig:Transform Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#" />
        </dsig:Transforms>
        <dsig:DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
        <dsig:DigestValue>Vbx4uP8eSuU1+F+A9utw+w55JbE=</dsig:DigestValue>
      </dsig:Reference>
    </dsig:SignedInfo>
    <dsig:SignatureValue>.....S9S3ow==</dsig:SignatureValue>
    <dsig:KeyInfo Id="Id-0001363929747121-b532e58c514bea930b29616c-5">
      <dsig:X509Data>
        <dsig:X509Certificate>MIIFfz.....NAWLwRIug==</dsig:X509Certificate>
      </dsig:X509Data>
    </dsig:KeyInfo>
  </dsig:Signature>
</ns:signature>
</soap:Header>
<soap:Body xml:id="Id-0001363929747121-b532e58c514bea930b29616c-3">
  <ns:getViewResponse
xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetView/1.0">
    <ns:responseStatus>
      <ns1:code
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
        >PCEHR_SUCCESS</ns1:code>
      <ns1:description>
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
        >SUCCESS</ns1:description>
    </ns:responseStatus>
    <ns:view>
      <ns:templateID>1.71.6531.3.2</ns:templateID>
      <ns:data>UEsDBB.....JgAAAAA=</ns:data>
    </ns:view>
  </ns:getViewResponse>
</soap:Body>
</soap:Envelope>
```

### 8.2.3 Functional Errors

For system errors, see [Appendix E](#). Possible generic errors include:

- PCEHR\_ERROR\_0004 – Authorisation denied (e.g. insufficient privileges to retrieve the view)
- PCEHR\_ERROR\_0011 – Unexpected service exception error (e.g. in case view cannot be generated)
- PCEHR\_ERROR\_0015 – IHI is required
- PCEHR\_ERROR\_0016 – Invalid service version

The functional errors for the View Service responses are given below in Table 34.

Table 34: View Service functional errors

errorCode	contextCode	Explanation
PCEHR_SUCCESS	SUCCESS	The PCEHR System returns a successful result to the query.
PCEHR_ERROR_1600	Too many entries found	This is a getAuditView Functional Error. The selected search range is too large.
PCEHR_ERROR_3002	Document metadata failed validation	This is a getDocumentList Standard Error/XDS.b Error. The description of the document is not valid.
PCEHR_ERROR_6501	View could not be generated	This is a getView Functional Error from the PCEHR System.
PCEHR_ERROR_6001	No representatives found	This is a getRepresentativeList Functional Error from the PCEHR System.
PCEHR_ERROR_0016	Invalid service version	The versionNumber provided in the request message is does not match available service versions
PCEHR_ERROR_0138	Invalid start date	The fromDate supplied in the request message is not valid
PCEHR_ERROR_0139	Invalid end date	The toDate supplied in the request message is not valid
PCEHR_ERROR_6002	Invalid observation type	The observationType parameter supplied for the Observation View requested is invalid
PCEHR_ERROR_6003	Invalid document source	The documentSource parameter supplied for the Observation View requested is invalid

#### Example:

The example below shows an unauthorised access to a getView request.

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/PCEHRProfile/1.1/PCEHRProfilePortType/Fault/standardError
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001340084760039-b602069b4fe0121803090000-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:d5fbelae-5423-46cf-ae66-bd6eb97d715e</wsa:RelatesTo>
  </soap:Header>
  <soap:Body>
```



```

<soap:Fault>
  <soap:Code>
    <soap:Value>soap:Sender</soap:Value>
  </soap:Code>
  <soap:Reason>
    <soap:Text xml:lang="en-AU">PCEHR_ERROR</soap:Text>
  </soap:Reason>
  <soap:Detail>
    <ns2:standardError xmlns:ns2="http://ns.electronichealth.net.au/wsp/xsd/StandardError/2010">
      <ns2:errorCode>notAuthorised</ns2:errorCode>
      <ns2:message>PCEHR_ERROR_0004 - Authorisation denied</ns2:message>
    </ns2:standardError>
  </soap:Detail>
</soap:Fault>
</soap:Body>
</soap:Envelope>

```

## 8.3 getChangeHistoryView

The getChangeHistoryView service operation provides a list of document metadata that has been registered to the PCEHR System for a specific document. It provides a view of all versions of a specific document. The requestor must have access to both the PCEHR associated with the IHI number specified in the header and the document id specified in the body.

### 8.3.1 Request

**Name of Request:** getChangeHistoryView

#### Inputs

PCEHRHeader (see section 4.4).

The `ihiNumber` and the `accessingOrganisation.organisationID` must be set in the PCEHR Header.

#### getChangeHistoryView

See getChangeHistoryView section of the *PCEHR View Service Technical Services Specification* [VIEW TSS].

Table 35: getChangeHistoryView inputs

getChangeHistoryView Elements	Explanation
documentID	XSDDocumentEntry.uniqueID of document. This will be an OID.

#### Example

The example below shows an accessing organisation requesting a Change History View for a specified IHI number and document ID.

```

<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/pcehr/svc/GetChangeHistoryView/1.1/GetChangeHistoryViewPortType/getChangeHistoryViewRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-3991a0b8-e346-4719-a74d-fb86470abe66">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
      </User>
    </h:PCEHRHeader>
  </s:Header>
  <s:Body>
    <documentID>8003619166674595</documentID>
  </s:Body>
</s:Envelope>

```

```

        <username>John Doe</username>
        <useRoleForAudit>>false</useRoleForAudit>
    </User>
    <ihiNumber>8003601243017717</ihiNumber>
    <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
    </productType>
    <clientSystemType>CIS</clientSystemType>
    <accessingOrganisation>
        <organisationID>800362083337558</organisationID>
        <organisationName>Local Practice</organisationName>
    </accessingOrganisation>
</h:PCEHRHeader>
<h:signature .....>
    .....
</h:signature>
    .....
    <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:35a7cd17-66c5-4780-a
59f-cdd70ce6ef10</MessageID>
    .....
</s:Header>
    <s:Body xml:id="body-50fe0065-bde1-4e94-a458-6ad3ea16433a">
        <getChangeHistoryView xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/G
etChangeHistoryView/1.0">
            <documentID xmlns="">urn:uuid:87990e0b-9349-4a4c-83e8-d4b894a0b215</documentID>
        </getChangeHistoryView>
    </s:Body>
</s:Envelope>

```

### 8.3.2 Response

**Response Name:** getChangeHistoryResponse

*Table 36: getChangeHistoryResponse elements*

getChangeHistoryResponse Element	Explanation
adhocQueryResponse	Multiple instances Attribute: nillable=true See section 7.4 for details on the adhocQueryResponse and its elements
registryObjectList	See Appendix D.2 for details on the XDS element set listed in registryObjectList

#### Example

The example below is a response to a successful request. The extrinsic objects (i.e. the document metadata sets for the documents) have been removed. See the code sample starting on page 38 for a full extrinsic object. The structure of an extrinsic object and the relationship of these elements to the XDS.b standard is given in the XDS Submission set table on page 36.

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
    <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
        <wsa:Action>
            http://ns.electronichealth.net.au/pcehr/svc/GetChangeHistoryView/1.1/GetChangeHistoryViewPortType/getChangeHistoryViewResponse
        </wsa:Action>
        <wsa:MessageID>urn:uuid:32fceed7-e1a4-45cc-a72f-16f683b927b2</wsa:MessageID>
        <wsa:RelatesTo>urn:uuid:35a7cd17-66c5-4780-a59f-cdd70ce6ef10</wsa:RelatesTo>
    </soap:Header>

```

```

<ns:signature .....>
.....
</ns:signature>
</soap:Header>
<soap:Body xmlns:S="http://schemas.xmlsoap.org/soap/envelope/" xml:id="Id-0001340255872
204-f89cb9a14fe2ae801759000-2">
  <ns:getChangeHistoryViewResponse xmlns:ns="http://ns.electronichealth.net.au/pcehr/xs
d/interfaces/GetChangeHistoryView/1.0">
    <AdhocQueryResponse status="urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Suc
cess">
      <ns4:RegistryObjectList xmlns:ns2="urn:hl7-org:v3" xmlns:ns4="urn:oasis:names:tc:
ebxml-regrep:xsd:rsm:3.0" xmlns:ns3="http://ns.electronichealth.net.au/Ci/Cda/Extensions/
3.0" xmlns:ns5="urn:oasis:names:tc:ebxml-regrep:xsd:rs:3.0" xmlns:ns6="http://common.htb.
ws.pcehr.au/" xmlns:ns7="http://common.pna.ws.pcehr.au/" xmlns:ns8="http://view.htb.ws.p
cehr.au/">
        <ns4:ExtrinsicObject isOpaque="false" mimeType="application/zip" status="urn:oa
sis:names:tc:ebxml-regrep:StatusType:Deprecated" objectType="urn:uuid:7edca82f-054d-47f2-
a032-9b2a5b5186c1" lid="urn:uuid:d4e514c1-c5a7-4764-9ffb-35c36598c921" id="urn:uuid:d4e51
4c1-c5a7-4764-9ffb-35c36598c921">
          <ns4:Slot name="creationTime">
            <ns4:ValueList>
              <ns4:Value>201112011100</ns4:Value>
            </ns4:ValueList>
          </ns4:Slot>
          <ns4:Slot name="hash">
            <ns4:ValueList>
              <ns4:Value>cd64eb3a2adc1fd2da2dc5bb905c0cae40eeb604</ns4:Value>
            </ns4:ValueList>
          </ns4:Slot>
          .....
        </ns4:ExtrinsicObject>
        <ns4:ExtrinsicObject isOpaque="false" mimeType="application/zip" status="urn:oa
sis:names:tc:ebxml-regrep:StatusType:Approved" objectType="urn:uuid:7edca82f-054d-47f2-a0
32-9b2a5b5186c1" lid="urn:uuid:87990e0b-9349-4a4c-83e8-d4b894a0b215" id="urn:uuid:87990e0
b-9349-4a4c-83e8-d4b894a0b215">
          <ns4:Slot name="creationTime">
            <ns4:ValueList>
              <ns4:Value>201112011100</ns4:Value>
            </ns4:ValueList>
          </ns4:Slot>
          <ns4:Slot name="hash">
            <ns4:ValueList>
              <ns4:Value>dce01ef28118796f8fa4de9ef3c40ec6d2a15135</ns4:Value>
            </ns4:ValueList>
          </ns4:Slot>
          .....
        </ns4:ExtrinsicObject>
      </ns4:RegistryObjectList>
    </AdhocQueryResponse>
  </ns:getChangeHistoryViewResponse>
</soap:Body>
</soap:Envelope>

```

### Functional Errors

If a get change history view operation is performed without a valid HPI-O, a "PCEHR\_ERROR\_0505 – Invalid HPI-O" error is received from the PCEHR System.

For the functional error codes for the View Service, see [Table 34](#) on page 64.

### Example

This is an example of an error message has encountered by an implementer. No metadata was sent in the request. The error was could have been as a result of database corruption.

```

<?xml version="1.0" encoding="UTF-8"?>
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header><wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">http://ns.ele
ctronichealth.net.au/pcehr/svc/GetChangeHistoryView/1.1/GetChangeHistoryViewPortType/Fault/standardError</wsa:Action><wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressin
g">uuid:Id-0001340083729935-a22a11834fe00e1117f90000-1</wsa:MessageID><wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:16eb7191-561c-4110-b2ce-20f3eb79ed06</wsa:RelatesTo></soap:Header>
  <soap:Body>
    <soap:Fault>
      <soap:Code>
        <soap:Value>soap:Sender</soap:Value>
      </soap:Code>
      <soap:Reason>
        <soap:Text xml:lang="en-AU">PCEHR_ERROR</soap:Text>
      </soap:Reason>
      <soap:Detail>
        <ns2:standardError xmlns:ns2="http://ns.electronichealth.net.au/wsp/xsd/StandardError/2010">
          <ns2:errorCode>badParam</ns2:errorCode>
          <ns2:message>PCEHR_ERROR_3002 -
Document metadata failed validation</ns2:message>
        </ns2:standardError>
      </soap:Detail>
    </soap:Fault>
  </soap:Body>
</soap:Envelope>

```

## 8.4 getAuditView

The getAudit operation is responsible for returning an audit trail from the audit logs of either a healthcare provider organisation (HPI-O) or an individual (IHI). If the request is from a healthcare provider organisation, the PCEHR System provides all audit events for the provider across multiple PCEHRs. If the request is from the owner of a PCEHR, the PCEHR System provides audit events for the owner of the PCEHR.

The information provided is constrained by the requestor's access rights and role in the PCEHR System. The healthcare provider organisation is able to access only a subset of the audit events. Owners of PCEHRs are allowed to access all their audit event records.

### 8.4.1 Request

**Name of Request:** getAuditView

#### Inputs

PCEHRHeader (see section 4.4).

The accessingOrganisation.organisationID **SHALL** be set and the ihiNumber left null in the PCEHR Header if the request is from an organisation.

**Note:** For Registered Consumer Portal only: if the request is from an individual, than the ihiNumber **SHALL** be set and the accessingOrganisation.organisationID left null.

#### getAuditView

See getAuditView section of the PCEHR View Service Technical Services Specification [VIEW TSS]

Table 37: getAuditHistoryView inputs

getAuditView Elements	Explanation
DateFrom	Sample: 2012-04-24T13:00:00+10:00
DateTo	Sample: 2012-04-24T15:00:00+10:00

The response will either give all the interactions of the organisation, regardless of IHI; or, all the interactions of the individual, regardless of organisation.

### Example

A getAuditView request example is shown below.

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/pcehr/svc/GetAuditView/1.1/GetAuditViewPortType/getAuditViewRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-4ff354fb-b78b-4ef7-8a83-40e8ce3982e0">
      <User>
        <IDType>HPPII</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>>false</useRoleForAudit>
      </User>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003620833337558</organisationID>
        <organisationName>Local Practice</organisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature .....>
      .....
    </h:signature>
    .....
    <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:8763c2b8-c238-4f0e-be60-80cb29be3722</MessageID>
    .....
  </s:Header>
  <s:Body xml:id="body-e468c705-cb52-4faf-9cd5-be3b89b60bb8">
    <getAuditView xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetAuditView/1.1">
      <dateFrom>2012-06-19T11:13:26.412463+10:00</dateFrom>
      <dateTo>2012-06-19T12:13:26.412463+10:00</dateTo>
    </getAuditView>
  </s:Body>
</s:Envelope>
```

## 8.4.2 Response

**Name of Response:** getAuditViewResponse.

### Outputs

Table 38: getAuditViewResponse elements

getAuditViewResponse Elements		Explanation	
responseStatus	code	One of the codes given in <a href="#">Table 34</a> on page 64.	
	Description	The corresponding <code>contextCode</code> in <a href="#">Table 34</a> on page 64.	
	Details	Additional detail of the response	
AuditView	EventTrail	AuditEvent	See <a href="#">Table 39</a> below.
LogEvent	messageLogLevel		WARN   ERROR   DEBUG   FATAL   AUDIT   INFO

Table 39: AuditEvent elements

AuditEvent Elements		Explanation	
businessEvent		Unique internal event identifier.	
eventTimeStamp		Business event date time	
AuditEvent	auditEventID		
	participantDetails	providerID	HPI-I number
		providerName	
		accessing HPIO	
		accessingHPIOName	
		participatingHPIO	
		participatingHPIOName	
		userID	
		userName	
		displayRole	
	accessedEntity	ihiNumber	The individual consumer's IHI
		ihiName	Name of the consumer
		subjectType	The accessed document's subject type
		subject	The subject of the document
	participantAction	actionType	Create   Read   Update   Delete
		operationPerformed	B2B operation performed.
		Reason	IncorrectIdentity   MedicalInaccuracy   ElectToRemove   IHIStatusIsDeceased   NoLegallyAppointmentAuthorised

AuditEvent Elements	Explanation
	NoOwnershipOfPCEHR   IHINotActive   IHINotVerified   TermsAndConditionsWereNotAccepted   Death   WithdrawalFromParticipation
approvalDatetime	Approval date time
approvalRole	Approval role
approvalName	Approval name
statusPriorActivation	Status prior activation
accessConditions	accessLevel
	Self   General   Limited
	accessPermission
	Permit   deny
	accessConditions
	OpenAccess   PACAccess, PACXAccess   EmergencyAccess   LocalConsentAccess   AuthorisedRepresentativeAccess   NominatedRepresentativeAccess   IncorrectCode   LocalConsentAccess   Denied   AccessRevoked

### Example

The following is a successful getAuditViewResponse

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>
      http://ns.electronichealth.net.au/pcehr/svc/GetAuditView/1.1/GetAuditViewPortType/getAuditViewResponse
    </wsa:Action>
    <wsa:MessageID>urn:uuid:36c6d967-6e14-4644-a6fd-3389f748efc8</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:8763c2b8-c238-4f0e-be60-80cb29be3722</wsa:RelatesTo>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <soap-env:Body xmlns:soap-env="http://www.w3.org/2003/05/soap-envelope" xml:id="Id-0001340072006889-12199f774fdfe04604390000-2">
    <ns:getAuditViewResponse xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetAuditView/1.1">
      <ns:responseStatus>
        <ns1:code xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">PCEHR_SUCCESS</ns1:code>
        <ns1:description xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">Records Returned: 2</ns1:description>
        <ns1:details xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">HealthCareOrganisationAuditHistoryView</ns1:details>
      </ns:responseStatus>
      <ns:auditView>
        <ns:eventTrail>
          <ns:businessEvent>getAuditView</ns:businessEvent>
          <ns:eventTimeStamp>2012-06-19T12:11:00.337+10:00</ns:eventTimeStamp>
          <ns:auditEvent>
            <ns:participantDetails>
              <ns1:accessingHPIO xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">8003620833337558</ns1:accessingHPIO>
              <ns1:accessingHPIOName xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">Local Practice</ns1:accessingHPIOName>
              <ns1:participatingHPIO xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">8003620833337558</ns1:participatingHPIO>
              <ns1:participatingHPIOName xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">TestOrg1</ns1:participatingHPIOName>
            </ns:participantDetails>
            <ns:accessedEntity>
              <ns1:ihiNumber xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">8003601243017717</ns1:ihiNumber>
            </ns:accessedEntity>
          </ns:auditEvent>
        </ns:eventTrail>
      </ns:auditView>
    </ns:getAuditViewResponse>
  </soap-env:Body>
</soap:Envelope>
```

```

        <ns1:subjectType xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">DocumentID</ns1:subjectType>
        <ns1:subject xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">urn:uuid:e6c40098-367f-42d6-b2bd-aff3b3a17c1a</ns1:subject>
    </ns:accessedEntity>
    <ns:participantAction>
        <ns1:actionType xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">Read</ns1:actionType>
        <ns1:operationPerformed xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">getChangeHistoryView</ns1:operationPerformed>
    </ns:participantAction>
    <ns:accessConditions/>
</ns:auditEvent>
</ns:eventTrail>
<ns:eventTrail>
    <ns:businessEvent>getAuditView</ns:businessEvent>
    <ns:eventTimeStamp>2012-06-19T12:04:32.828+10:00</ns:eventTimeStamp>
    <ns:auditEvent>
        .....
        <ns:accessConditions/>
    </ns:auditEvent>
</ns:eventTrail>
</ns:auditView>
</ns:getAuditViewResponse>
</soap-env:Body>
</soap:Envelope>

```

### Functional Errors

If the Date To and Date From values are not provided in the getAuditViewRequest, a "PCEHR\_ERROR\_0003 – SOAP body fault" appears in the PCEHR System's response. See [Appendix E](#).

For the functional error codes for the View Service, see [Table 34](#) on page 64.

### Example:

Here, the `ihiNumber` and `organisationID` were not populated in the PCEHR header of the request, resulting in the following response:

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/GetAuditView/1.1/GetAuditViewPort
      Type/Fault/standardError
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001337831614780-31298d5c4fbb0be0f990000-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">uuid:0597b198-
    9bd8-4140-8cc0-89515bfeed66</wsa:RelatesTo>
  </soap:Header>
  <soap:Body>
    <soap:Fault>
      <soap:Code>
        <soap:Value>soap:Sender</soap:Value>
      </soap:Code>
      <soap:Reason>
        <soap:Text xml:lang="en-AU">PCEHR_ERROR</soap:Text>
      </soap:Reason>
      <soap:Detail>
        <ns2:standardError xmlns:ns2="http://ns.electronichealth.net.au/wsp/xsd/S
        tandardError/2010">
          <ns2:errorCode>badlyFormedMsg</ns2:errorCode>
          <ns2:message>PCEHR_ERROR_0003 – SOAP body fault</ns2:message>
        </ns2:standardError>
      </soap:Detail>
    </soap:Fault>
  </soap:Body>
</soap:Envelope>

```



## 8.5 ITI-18 registryStoredQuery (getDocumentList)

The registry stored query is the operation that provides a list of clinical documents that exist in the PCEHR System for a PCEHR. This operation implements the concept of get document list view.

The ITI-18 query is also used in Document Exchange, and is more fully documented in section 7.4.

### 8.5.1 Request

For inputs, see section 7.4.1.

#### Example

This is a sample getIndexViewRequest for a particular document (identified by the \$XSDDocumentEntryPatientId slot). The request is identified as a getIndexView by being an AdhocQuery with an id attribute of 14d4debef-8f97-4251-9a74-a90016b0af0d = findDocument (see Appendix B).

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">urn:ihe:iti:2007:RegistryStoredQuery</Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-27e05478-ca98-483d-869f-7aee9a7a8a">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <ihiNumber>8003601243017717</ihiNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003620833337558</organisationID>
        <organisationName>Local Practice</organisationName>
        <alternateOrganisationName>John Doe</alternateOrganisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature .....>
      .....
    </h:signature>
    .....
    <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:18bca8ae-836d-453a-a79f-c760a03107d8</MessageID>
    .....
  </s:Header>
  <s:Body xml:id="body-31d1a0eb-e6f6-4667-ac92-b3ca8ce03847">
    <AdhocQueryRequest xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:query:3.0">
      <ResponseOption returnType="LeafClass"/>
      <AdhocQuery xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0" id="urn:uuid:14d4debef-8f97-4251-9a74-a90016b0af0d">
        <Slot name="$XSDDocumentEntryPatientId">
          <ValueList>
            <Value>'8003601243017717^^^&1.2.36.1.2001.1003.0&ISO'</Value>
          </ValueList>
        </Slot>
        <Slot name="$XSDDocumentEntryStatus">
          <ValueList>
            <Value></Value>
          </ValueList>
        </Slot>
      </AdhocQuery>
    </AdhocQueryRequest>
  </s:Body>
</s:Envelope>
```

```

        ('urn:oasis:names:tc:ebxml-regrep:StatusType:Approved')
    </Value>
</ValueList>
</Slot>
</AdhocQuery>
</AdhocQueryRequest>
</s:Body>
</s:Envelope>

```

## 8.5.2 Response

### Example

The successful sample response to the above registry stored query follows. For a full example of an extrinsic object, see the code sample on page 38, and for the structure of the extrinsic object see the tables on XDS Document Set starting on page 35.

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:ihe:iti:2007:RegistryStoredQueryResponse</wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001340071471898-7ec645ea4fdfde2f0c69ff17-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:18bca8ae-836d-453a-a79f-c760a03107d8</wsa:RelatesTo>
    <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
      <wsa:Action xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">urn:ihe:iti:2007:RegistryStoredQuery</wsa:Action>
      <wsa:MessageID>urn:uuid:227f1d98-a949-49ed-ab65-82b384d98516</wsa:MessageID>
      <wsa:RelatesTo>urn:uuid:18bca8ae-836d-453a-a79f-c760a03107d8</wsa:RelatesTo>
      <wsa:ReplyTo>
        <wsa:Address>http://www.w3.org/2005/08/addressing/anonymous</wsa:Address>
      </wsa:ReplyTo>
      <wsa:From>
        <wsa:Address>http://www.w3.org/2005/08/addressing/anonymous</wsa:Address>
      </wsa:From>
      <wsa:To xmlns:s="http://www.w3.org/2003/05/soap-envelope" s:mustUnderstand="1">http://144.140.140.218/getDocumentList</wsa:To>
    </soap:Header>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <soap:Body xmlns:S="http://schemas.xmlsoap.org/soap/envelope/" xml:id="Id-0001340071471898-7ec645ea4fdfde2f0c69ff17-2">
    <ns8:AdhocQueryResponse xmlns:ns4="urn:hl7-org:v3" xmlns:ns3="http://common.pna.ws.pcehr.au/" xmlns:ns9="http://common.htb.ws.pcehr.au/" xmlns:ns5="http://ns.electronichealth.net.au/Ci/Cda/Extensions/3.0" xmlns:ns6="urn:oasis:names:tc:ebxml-regrep:xsd:rims:3.0" xmlns:ns10="http://view.htb.ws.pcehr.au/" xmlns:ns7="urn:oasis:names:tc:ebxml-regrep:xsd:rs:3.0" xmlns:ns8="urn:oasis:names:tc:ebxml-regrep:xsd:query:3.0" status="urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Success">
      <ns6:RegistryObjectList>
        <ns6:ExtrinsicObject isOpaque="false" mimeType="application/zip" status="urn:oasis:names:tc:ebxml-regrep:StatusType:Approved" objectType="urn:uuid:7edca82f-054d-47f2-a032-9b2a5b5186c1" lid="urn:uuid:e6c40098-367f-42d6-b2bd-aff3b3a17c1a" id="urn:uuid:e6c40098-367f-42d6-b2bd-aff3b3a17c1a">
          .....
        </ns6:ExtrinsicObject>
      </ns6:RegistryObjectList>
    </ns8:AdhocQueryResponse>
  </soap:Body>
</soap:Envelope>

```

### Functional Errors

If an invalid HPI-O is used when the get document list operation is performed, an XDSRegistry error (PCEHR\_ERROR\_0505 - Invalid HPI-O) is received from the PCEHR System.

For the functional error codes for the View Service, see [Table 34](#) on page 64.

### Example

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:ihe:iti:2007:RegistryStoredQueryResponse</wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001340083323011-66b99d394fe00c7b0d99eb03-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:6bb516a1-b7ec-4e39-9c5e-1d93b4df333b</wsa:RelatesTo>
  </soap:Header>
  <soap:Body>
    <query:AdhocQueryResponse xmlns:query="urn:oasis:names:tc:ebxml-regrep:xsd:query:3.0"
      status="urn:oasis:names:tc:ebxml-regrep:ResponseStatusType:Failure">
      <rs:RegistryErrorList xmlns:rs="urn:oasis:names:tc:ebxml-regrep:xsd:rs:3.0">
        <rs:RegistryError codeContext="PCEHR_ERROR_0509 - SOAP header fault"
          errorCode="XDSRegistryError" severity="urn:oasis:names:tc:ebxml-regrep:ErrorSeverityType:Error"
          location="PCEHR Interface"/>
      </rs:RegistryErrorList>
      <rim:RegistryObjectList xmlns:rim="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0"/>
    </query:AdhocQueryResponse>
  </soap:Body>
</soap:Envelope>
```

## 8.6 getIndividualDetailsView

### 8.6.1 Request

**Name of Request:** getIndividualDetailsView

#### Inputs

PCEHRHeader (see section 4.4).

The accessingOrganisation.organisationID must be set and the ihiNumber specified in the PCEHR Header if the request is from an organisation.

#### getIndividualDetailsView

See getIndividualDetailsView section of the PCEHR View Service Technical Services Specification [[VIEW TSS](#)]

Table 40: getIndividualDetailsView inputs

Elements	Explanation
getIndividualDetailsView	Only the root element is required.

## Example

Get individual details view request example:

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/pcehr/svc/GetIndividualDetailsView/1.0/GetIndividualDetailsViewPortType/getAuditViewRequest
    </Action>
  </s:Header>
  .....
</s:Envelope>
```

## 8.6.2 Response

**Name of Response:** getIndividualDetailsViewResponse.

### Outputs

Table 41: getIndividualDetailsViewResponse elements

getIndividualDetailsViewResponse Elements		Explanation	
responseStatus	code	One of the codes given in Table 34 on page 64.	
	Description	The corresponding contextCode in Table 34 on page 64.	
	Details	Additional detail of the response	
AuditView	EventTrail	AuditEvent	See Table 39.
LogEvent	messageLogLevel		WARN   ERROR   DEBUG   FATAL   AUDIT   INFO

Table 42: getIndividualDetailsViewResponse elements

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
individual			1..1	The individual details associated with the request PCEHR.
	Name		1..1	
		familyName	1..1	
		givenName	0..2	
		Usage	0..1	
		preferred	0..1	
	sex		1..1	
	dateOfBirth		1..1	
	dateAccuracyIndicatorType		0..1	
	ihiRecordStatus		0..1	
	ihiStatus		0..1	
	ihiNumber		1..1	
	contactDetails		0..1	
	contactPersons		0..1	

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
	indigenousStatus		1..1	

### Example

The following is a successful `getIndividualDetailsViewResponse`.

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing"
>http://ns.electronichealth.net.au/pcehr/svc/GetIndividualDetailsView/2.0/GetIndividualD
etailsViewPortType/getIndividualDetailsViewResponse</wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing"
>urn:uuid:275e7755-0117-41a7-b77b-d4b560a6c54e</wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing"
>urn:uuid:af407509-640f-4b4b-bf00-0d7553c8feal</wsa:RelatesTo>
  </soap:Header>
  <soap:Body xmlns:S="http://schemas.xmlsoap.org/soap/envelope/"
xml:id="Id-0001368415486050-81b6075751905cfeaba90000-3">
    <ns:getIndividualDetailsViewResponse
xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetIndividualDetailsVie
w/2.0">
      <ns:responseStatus>
        <ns1:code
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
>PCEHR_SUCCESS</ns1:code>
        <ns1:description
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
>SUCCESS</ns1:description>
      </ns:responseStatus>
      <ns:individual>
        <ns1:name
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
          <ns1:familyName>DIXON</ns1:familyName>
          <ns1:givenName>JAY</ns1:givenName>
          <ns1:givenName>K</ns1:givenName>
          <ns1:usage>L</ns1:usage>
          <ns1:preferred>true</ns1:preferred>
        </ns1:name>
        <ns1:sex
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
>M</ns1:sex>
        <ns1:dateOfBirth
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
>1997-02-26</ns1:dateOfBirth>
        <ns1:dateAccuracyIndicatorType
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
>AAA</ns1:dateAccuracyIndicatorType>
        <ns:ihiRecordStatus>Verified</ns:ihiRecordStatus>
        <ns:ihiStatus>Active</ns:ihiStatus>
        <ns1:ihiNumber
xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
>8003608166686493</ns1:ihiNumber>
        <ns:indigenousStatus>1</ns:indigenousStatus>
      </ns:individual>
    </ns:getIndividualDetailsViewResponse>
  </soap:Body>
</soap:Envelope>
```

## Functional Errors

Table 43: View Service functional errors

errorCode	contextCode	Explanation
PCEHR_SUCCESS	SUCCESS	The PCEHR System returns a successful result to the query.
PCEHR_ERROR_5101	PCEHR not found	This is a getIndividualDetailsView"OSB Functional Error from the PCEHR System

### Example

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/GetIndividualDetailsView/1.1/GetA
uditViewPortType/Fault/standardError
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001337831614780-31298d5c4fbb0be0f990000-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">uuid:0597b198-
9bd8-4140-8cc0-89515bfeed66</wsa:RelatesTo>
  </soap:Header>
  <soap:Body>
    <soap:Fault>
      <soap:Code>
        <soap:Value>soap:Sender</soap:Value>
      </soap:Code>
      <soap:Reason>
        <soap:Text xml:lang="en-AU">PCEHR_ERROR</soap:Text>
      </soap:Reason>
      <soap:Detail>
        <ns2:standardError xmlns:ns2="http://ns.electronichealth.net.au/wsp/xsd/S
tandardError/2010">
          <ns2:errorCode>badlyFormedMsg</ns2:errorCode>
          <ns2:message>PCEHR_ERROR_0003 - SOAP body fault</ns2:message>
        </ns2:standardError>
      </soap:Detail>
    </soap:Fault>
  </soap:Body>
</soap:Envelope>
```

## 8.7 getRepresentativeList

### 8.7.1 Request

**Name of Request:** getRepresentativeList

#### Inputs

PCEHRHeader (see section 4.4).

The accessingOrganisation.organisationID must be set and the ihiNumber specified in the PCEHR Header if the request is from an organisation.

#### getRepresentativeList

See getRepresentativeList section of the PCEHR View Service Technical Services Specification [VIEW TSS].

Table 44: *getRepresentativeList* inputs

getRepresentativeListRequest Elements	Explanation
Null	PCEHR General Header is used to pass key parameters such as IHI of representative and HPI-O of accessing organisation

**Example**

GetRepresentativeList view request example (where most of the SignatureValue and dsig:X509Certificate have been replaced with "....."):

```

<s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <a:Action s:mustUnderstand="1"
>http://ns.electronichealth.net.au/pcehr/svc/GetRepresentativeList/1.1/GetRepresentativeL
istPortType/getRepresentativeListRequest</a:Action>
    <h:PCEHRHeader
      xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
      xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
      xmlns:xsd="http://www.w3.org/2001/XMLSchema"
      xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
      xml:id="header-ec5ab3e2-41d5-492d-a620-7f4f136e8278">
        <User>
          <IDType>HPID</IDType>
          <ID>pwilford</ID>
          <username>JoeBloggs</username>
          <useRoleForAudit>>false</useRoleForAudit>
        </User>
        <ihiNumber>8003604570901339</ihiNumber>
        <productType>
          <vendor>NEHTA</vendor>
          <productName>Test Harness</productName>
          <productVersion>1.0</productVersion>
          <platform>Windows 7</platform>
        </productType>
        <clientSystemType>CIS</clientSystemType>
        <accessingOrganisation>
          <organisationID>8003624166667177</organisationID>
          <organisationName>Medicare-305</organisationName>
        </accessingOrganisation>
      </h:PCEHRHeader>
      <h:signature
        xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
        xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
        <Signature xmlns="http://www.w3.org/2000/09/xmldsig#">
          <SignedInfo>
            <CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
            <SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-
sha1" />
            <Reference URI="#body-21ad0303-0513-4fa9-93b5-4af46595017d">
              <Transforms>
                <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
              </Transforms>
              <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1" />
                <DigestValue>uzmAZwRUWSVwfIJLaRXCjJKq83U=</DigestValue>
              </Reference>
            <Reference URI="#header-ec5ab3e2-41d5-492d-a620-7f4f136e8278">
              <Transforms>
                <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#" />
              </Transforms>

```

```

        <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
        <DigestValue>1xqBaAVTTsFIaLI/2QqS/cpMRRE=</DigestValue>
    </Reference>
    <Reference URI="#timestamp-cd091e84-2dbb-4cb6-a626-cf94da8d424f">
        <Transforms>
            <Transform Algorithm="http://www.w3.org/2001/10/xml-exc-
c14n#"/>
        </Transforms>
        <DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
        <DigestValue>43xeBQz3e2Dk5VeesSESUM8Peps=</DigestValue>
    </Reference>
    </SignedInfo>
    <SignatureValue>.....jHMWGA==</SignatureValue>
    <KeyInfo>
        <X509Data>
            <X509Certificate>.....ZxVC8S0EgAw==</X509Certificate>
        </X509Data>
    </KeyInfo>
    </Signature>
</h:signature>
<h:timestamp

xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
    xml:id="timestamp-cd091e84-2dbb-4cb6-a626-cf94da8d424f">
        <created>2013-05-06T02:54:50.7381339Z</created>
    </h:timestamp>
    <a:MessageID>urn:uuid:f60a8a6b-6e59-4e58-a70b-27c66dfce022</a:MessageID>
    <a:ReplyTo>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:ReplyTo>
    <VsDebuggerCausalityData
        xmlns="http://schemas.microsoft.com/vstudio/diagnostics/servicemodelsink"
>uIDPo+bumv04Bq1PkjVeLYZcOe0AAAAARMe/s6xIeEuIbe5ZtQ9CNUfc5/kOkVtJmdQjHjJK6UQACQAA</VsDebu
ggerCausalityData>
    <a:From>
        <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
    </a:From>
    <a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:xsd="http://www.w3.org/2001/XMLSchema"
    xml:id="body-21ad0303-0513-4fa9-93b5-4af46595017d">
    <getRepresentativeList xsi:type="xsd:string"

xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetRepresentativeList/1.1"
    />
    </s:Body>
</s:Envelope>

```

## 8.7.2 Response

**Name of Response:** getRepresentativeListResponse.

### Outputs

Table 45: getRepresentativeListResponse elements

getRepresentativeListResponse Elements Explanation		
responseStatus	code	One of the codes given in Table 34 on page 64.
	Description	The corresponding contextCode in Table 34 on page 64.
	Details	Additional detail of the response
PCEHRRecord		See Table 39.



Table 46: *getRepresentativeListResponse* elements

Level 1 Element	Level 2 Element	Level 3 Element	Level 4 Element	Level 5 Element	Level 6 Element	Cardinality
PCEHRRecord	RepresentativeList	Representative	type			
PCEHRRecord	RepresentativeList					1..1
		Representative				1..*
			ID			1..1
			Address			0..1
				unstructured Address		0..1
					postCode	1..1
					suburb	1..1
					state	1..1
					australianAddressLine	1..1
				australianStreetAddress		0..1
					levelGroup	0..1
					streetName	0..1
					streetSuffix	1..1
					unitGroup	0..1
					state	0..1
					addressSiteName	1..1
					postCode	0..1
					lotNumber	1..1
					streetType	0..1
					streetNumber	0..1
					suburb	0..1
				australianPostalAddress		0..1
					suburb	1..1
					state	1..1
					postalDeliveryType	1..1
					postCode	1..1

Level 1 Element	Level 2 Element	Level 3 Element	Level 4 Element	Level 5 Element	Level 6 Element	Cardinality
			Name			1..1
				nameTitle		1..1
				usage		0..1
				FamilyName		0..1
				preferred		1..1
				GivenName		0..1
				nameSuffix		0..2
				conditionalUse		0..1

### Example

The following is a successful getRepresentativeListResponse.

```

<soap:Envelope
xmlns:nsCCE="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing"
>http://ns.electronichealth.net.au/pcehr/svc/GetRepresentativeListPortType/getRepresentativeListResponse</wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing"
>urn:uuid:4837c6e4-ad92-49cc-a46b-cee56a504a96</wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing"
>urn:uuid:580c3432-e67f-41aa-924e-fb4a61d7b2bf</wsa:RelatesTo>
  </soap:Header>
  <soap:Body xml:id="Id-0001368415492519-d072cf9f51905d04aca9616c-3">
    <ns:getRepresentativeListResponse
xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetRepresentativeList/1.1">
      <ns:responseStatus>
        <nsCCE:code>PCEHR_SUCCESS</nsCCE:code>
        <nsCCE:description>SUCCESS</nsCCE:description>
      </ns:responseStatus>
      <ns:PCEHRRecord>
        <ns:representativeList>
          <ns:representative>
            <ns:ID>979876534</ns:ID>
            <ns:type>Parent</ns:type>
            <ns:name>
              <nsCCE:familyName>CLINE</nsCCE:familyName>
              <nsCCE:givenName>SALMAN</nsCCE:givenName>
              <nsCCE:givenName>J</nsCCE:givenName>
              <nsCCE:usage>L</nsCCE:usage>
              <nsCCE:preferred>true</nsCCE:preferred>
            </ns:name>
          </ns:representative>
        </ns:representativeList>
      </ns:PCEHRRecord>
    </ns:getRepresentativeListResponse>
  </soap:Body>
</soap:Envelope>

```

## Functional Errors

These errors are specific to the GetRepresentativeList service.

errorCode	contextCode	Explanation
PCEHR_SUCCESS	SUCCESS	The PCEHR System returns a successful result to the query.
PCEHR_ERROR_5101	PCEHR not found	This is a getIndividualDetailsView OSB Functional Error from the PCEHR System
PCEHR_ERROR_6001	No representatives found	

For general error messages see [Appendix E](#).

### Example

GetRepresentativeList response message (where most of the SignatureValue and dsig:X509Certificate have been replaced with "....."):

```
<soap:Envelope
  xmlns:nsCCE="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">

<wsa:Action>http://ns.electronichealth.net.au/pcehr/svc/GetRepresentativeList/1.1/GetRepresentativeListPortType/getRepresentativeListResponse</wsa:Action>
  <wsa:MessageID>urn:uuid:be4da3d8-87a8-4184-ba59-04a800d25779</wsa:MessageID>
  <wsa:RelatesTo>urn:uuid:f60a8a6b-6e59-4e58-a70b-27c66dfce022</wsa:RelatesTo>
  <ns:signature

xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
  <dsig:Signature xmlns:dsig="http://www.w3.org/2000/09/xmldsig#"
    Id="Id-0001367808891980-2f49b52b51871b7b2509616c-4">
    <dsig:SignedInfo>
      <dsig:CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#"/>
      <dsig:SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rsa-sha1"/>
      <dsig:Reference URI="#Id-0001367808891980-2f49b52b51871b7b2509616c-3">
        <dsig:Transforms>
          <dsig:Transform Algorithm="http://www.w3.org/2001/10/xml-exc-c14n#"/>
        </dsig:Transforms>
        <dsig:DigestMethod
Algorithm="http://www.w3.org/2000/09/xmldsig#sha1"/>
          <dsig:DigestValue>py+OR0XXvcdn0cC4RybUvhIsj8E=</dsig:DigestValue>
        </dsig:Reference>
      </dsig:SignedInfo>
      <dsig:SignatureValue>aZQyMk.....Edg==</dsig:SignatureValue>
      <dsig:KeyInfo Id="Id-0001367808891980-2f49b52b51871b7b2509616c-5">
        <dsig:X509Data>
          <dsig:X509Certificate>.....WlwRIug==</dsig:X509Certificate>
        </dsig:X509Data>
      </dsig:KeyInfo>
    </dsig:Signature>
  </ns:signature>
</soap:Header>
<soap:Body xml:id="Id-0001367808891980-2f49b52b51871b7b2509616c-3">
  <ns:getRepresentativeListResponse

xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/GetRepresentativeList/1.1">
  <ns:responseStatus>
    <nsCCE:code>PCEHR_ERROR_6001</nsCCE:code>
    <nsCCE:description>No representatives found</nsCCE:description>
  </ns:responseStatus>
</ns:getRepresentativeListResponse>
</soap:Body>
</soap:Envelope>
```

# 9 Template Service

## 9.1 Overview

The Template Service enables implementers and systems to obtain standardised specifications for clinical documents to be exchanged within the Australian healthcare community. The Template Service is responsible for managing and storing the data representations associated with all of the data formats stored within a PCEHR System, but can also store specifications for clinical documents not associated with the PCEHR System.

The Template Service can be used to obtain information to validate and display documents conforming to a particular template. There are two methods by which this information can be obtained:

1. Manually via the Template Portal. The Template Portal allows a user to search for and download template packages. This allows developers, testers, and other interested parties to obtain information needed for building and testing systems which handle documents in accordance with the template content. Information obtained from the Template Service in this way may be statically incorporated within software products at the coding stage, with no need to dynamically update the information in future.
2. The Template Service offers two interfaces via the B2B Gateway that allow the same template packages to be dynamically obtained by connected systems. These interfaces also return additional metadata relevant to dynamic use.

**NOTE:** Once a template package has been published, the machine-usable components contained within it will never change, although the metadata may be updated. (See the Template Service Interface Logical Service Specification [[Template LSS](#)].) This makes it possible to incorporate statically obtained information into software and still interface successfully with systems utilising dynamic acquisition of the same information.

### 9.1.1 Template Definitions for Documents

The template packages contain the formal specifications relevant to the document. These are the same documents as published elsewhere, and can be used to confirm the version of the specification to which the template package conforms.

All the template packages published for PCEHR System use contain the applicable schema definitions. These are the CDA schema. See the Template Package Technical Specification [[Template PKG](#)] for details of the structure of the components within the package.

### 9.1.2 Template Support for Document Validation

The template packages contain validations relevant to a document conforming to the template. For the PCEHR template packages being published for the initial release, these are the same validations that are included in the CDA Validator, provided through the NEHTA Test Interest Group [[COLLAB TST GRP](#)]. These validations are Schematron based.

The Template Service does not provide any validation capabilities; it only houses the template packages which contain the validation criteria. Any system wishing to utilise validations to check the conformance of a document against the template has to create its own validation engine to utilise the definitions. The U.S. Department of Commerce makes available a tool via the National Institute of Standards and Technology [NIST] which may be of use (<http://xreg2.nist.gov/cda-validation/index.html>).

The template packages published for PCEHR use all contain the applicable schematron. See the Template Package Technical Specification [[Template\\_PKG](#)] for details of the structure of the components within the package.

### 9.1.3 Template Support for Document Display

The template packages contain example stylesheets which can be used to display a document conforming to the template. This is the NEHTA sample generic CDA stylesheet.

See the Template Package Technical Specification [[Template\\_PKG](#)] for details of the structure of the components within the package.

## 9.2 getTemplate

### 9.2.1 Request

**Name of request:** getTemplate

This operation retrieves a template package by use of its identifying OID, along with additional PCEHR-related request metadata.

#### Inputs

PCEHRHeader

#### getTemplate

See section 4 of the Template Service Interface Technical Service Specification [[Template TSS](#)] for the current list of the elements in the input, their data types, cardinality and conformance requirements.

Table 47: getTemplate inputs

Inputs	Explanation
getTemplate	templateid
	serviceRequestorOption
	<p>Possible values: FullPackage   MachineUsable</p> <p>Many packages contain large volumes of PDF files which are of no relevance for automated software use. Specifying MachineUsable causes the Service to return a Template Package from which these elements have been removed, reducing the volume of data to be transmitted and handled.</p> <p>Note: currently the MachineUsable option should be used. FullPackage has been blocked and results in a "PCEHR_ERROR_0004 – Authorisation denied" message.</p>

The getTemplate request is executed with a known TemplateID in order to obtain the definition, validation or display rendering information. The request will also give information on whether or not documents conforming to the template are being accepted by the PCEHR System.

A registered repository, when these become available in later implementations of the B2B Gateway, would execute the request based on the TemplateID being asserted by a document being stored. It would use the response in two ways:

1. To check whether or not the document can be submitted to the PCEHR System.
2. To validate the document for conformance against the template.

This checking and validation may also be performed by any clinical system that implements a process of dynamic document validation.

Validation may be performed even if the document is not to be submitted to the PCEHR System.

Where a document needs to be displayed or printed, any system may execute the request to obtain rendering information.

The fact that the components of the template package (other than the metadata) are constant, coupled with the size of the packages, means it is desirable to cache the results of a template package retrieval. To facilitate this, a PersistInCacheExpiry date/time is returned.

## Example

The example below shows a request for a machine-readable form of a template package.

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/tp1t/svc/GetTemplate/1.1/GetTemplatePortType/getTemplateRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-b2a6ed7e-c6c7-457c-adbf-0aeeec8c5c0f2">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
        <username>User1</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003620833337558</organisationID>
        <organisationName>Local Practice</organisationName>
        <alternateOrganisationName>Alternate Org Name</alternateOrganisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature .....>
      .....
    </h:signature>
    .....
    <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:d27f7e98-ac27-4fec-8435-68768f7afb0a</MessageID>
    .....
  </s:Header>
  <s:Body xml:id="body-8f2101b4-e4bd-475c-8ed4-278da996873c">
    <getTemplate xmlns="http://ns.electronichealth.net.au/tp1t/xsd/interfaces/GetTemplate/1.0">
      <templateID>1.2.36.1.2001.1006.1.16565.1</templateID>
      <serviceRequestorOption>MachineUsable</serviceRequestorOption>
    </getTemplate>
  </s:Body>
</s:Envelope>
```

## 9.2.2 Response

**Name of Response:** getTemplateResponse

### Outputs

See section 4 of the Template Service Interface Technical Service Specification [[Template TSS](#)] for the current list of the elements in the output, their data types, cardinality and the conformance requirements.

Table 48: *getTemplateResponse* elements

Outputs		Explanation
getTemplateResponse	responseStatus	Complex.
	Template	Complex.
	persistInCacheExpiry	The time after which the Template should be retrieved again to ensure any changes in metadata values are obtained.

Table 49: *responseStatus* elements

<i>responseStatus</i> elements	Explanation
code	Status Code for the result of the transaction
description	Brief status description
details	Additional detail of the response

Table 50: *template* subelements

<i>template</i> elements		Explanation
templateMetaData		Name/value pairs containing the metadata describing the template.
usageMetaData	PCEHRAcceptedStartDate	The time after which documents asserting conformance to this template can be submitted to the PCEHR.
	PCEHRAcceptedEndDate	The time after which documents asserting conformance to this template will no longer be accepted by the PCEHR.
	containsPCEHRAutomaticData	Any indicator that the PCEHR System will attempt to find atomic data within documents conforming to this template in order to cache for the construction of views for the PCEHR.
Package		Base64 Binary encoding of the Template Package.

**Example:**

The response to a machine-readable *getTemplate* request is shown below. Most of the template package has been omitted.

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>
      http://ns.electronichealth.net.au/tplt/svc/GetTemplate/1.1/GetTemplatePortType/getT
templateResponse
    </wsa:Action>
    <wsa:MessageID>urn:uuid:42ff21ee-4e47-42be-91db-e12f5c94fe14</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:d27f7e98-ac27-4fec-8435-68768f7afb0a</wsa:RelatesTo>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <S:Body xmlns:S="http://www.w3.org/2003/05/soap-envelope" xml:id="Id-0001340602427860-9
206c6394fe7f83b10396c61-3">
    <ns:getTemplateResponse xmlns:ns="http://ns.electronichealth.net.au/tplt/xsd/interfac
es/GetTemplate/1.0">
      <ns:responseStatus>
```



```

<ns1:code xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">PCEHR_SUCCESS</ns1:code>
<ns1:description xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">SUCCESS</ns1:description>
</ns:responseStatus>
<ns:template>
  <ns:templateMetadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateTypeCode</ns1:name>
      <ns1:value>60591-5</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateTypeCodeSystem</ns1:name>
      <ns1:value>2.16.840.1.113883.6.1</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateTypeCodeSystemName</ns1:name>
      <ns1:value>LOINC</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateTypeCodeDisplayName</ns1:name>
      <ns1:value>Patient summary</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateTypeTypeIdExtension</ns1:name>
      <ns1:value>POCD_HD000040</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateTypeTypeIdRoot</ns1:name>
      <ns1:value>2.16.840.1.113883.1.3</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateAdministrator</ns1:name>
      <ns1:value>CKM</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateClass</ns1:name>
      <ns1:value>ClinicalDocument</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateConformanceLevel</ns1:name>
      <ns1:value>3A</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateCustodian</ns1:name>
      <ns1:value>Nehta</ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateDescription</ns1:name>
      <ns1:value>
        Shared Health Summary clinical document - conformance level 3A
      </ns1:value>
    </ns1:metadata>
    <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TempLatesCoreElements/1.0">
      <ns1:name>TemplateDetailedDescription</ns1:name>
      <ns1:value>
        Template package for a PCEHR-conformant Shared Health Summary clinical document. Contains CDA implementation guide and schematrons for level 3A conformance checking
      </ns1:value>
    </ns1:metadata>
  </ns:templateMetadata>
</ns:template>

```

```

        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateFormatType</ns1:name>
            <ns1:value>CDA</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateFormatVersion</ns1:name>
            <ns1:value>2</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateID</ns1:name>
            <ns1:value>1.2.36.1.2001.1006.1.16565.1</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateKeyword</ns1:name>
            <ns1:value>CDA</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateKeyword</ns1:name>
            <ns1:value>Shared Health Summary</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateName</ns1:name>
            <ns1:value>Shared Health Summary</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateStatus</ns1:name>
            <ns1:value>Active</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateStatusEffectiveDate</ns1:name>
            <ns1:value>2012-05-31T00:00:00.000+10:00</ns1:value>
        </ns1:metadata>
        <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
            <ns1:name>TemplateVersion</ns1:name>
            <ns1:value>25</ns1:value>
        </ns1:metadata>
    </ns:templateMetadata>
    <ns:usageMetadata>
        <ns1:PCEHRAcceptedStartDate xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">2012-06-01T00:00:00.000+10:00</ns1:PCEHRAcceptedStartDate>
        <ns1:PCEHRAcceptedEndDate xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">2030-12-31T00:00:00.000+11:00</ns1:PCEHRAcceptedEndDate>
        <ns1:containsPCEHRAtomcData xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">false</ns1:containsPCEHRAtomcData>
    </ns:usageMetadata>
    <ns:package>
        UesDB.....urgf+Uek
    </ns:package>
</ns:template>
    <ns:persistInCacheExpiry>2012-06-28T23:59:59.782+10:00</ns:persistInCacheExpiry>
</ns:getTemplateResponse>
</S:Body>
</soap:Envelope>

```

## Error

Two types of errors may be returned by the PCEHR System:

- **Standard Error:** the PCEHR System will return this error when there is a Web Services Error as per the AT5820 specification during the transaction. This error will be returned as SOAP Fault. See [Appendix E](#).
- **Functional Error:** the PCEHR System will return this when there is a functional or business error during the transaction. This error will be return in the *responseStatus* within the SOAP Body. For a listing of these, see [Table 34](#).

## Response Status Codes

Table 51: *getTemplateResponse* functional elements

Status Code	Description	Suggested Action
PCEHR_SUCCESS	SUCCESS	The template package can be processed.
PCEHR_ERROR_1800	No Package	The package for the specified Template ID is not available for download. An error should be logged or displayed. The retrieval should not be retried.
PCEHR_ERROR_1801	Invalid Template ID	The Template Identifier is not present in the Template Service. This may be because the format of the identifier is invalid, or the template package is not present. An error should be logged or displayed. The retrieval should not be retried.

## 9.3 searchTemplate

### 9.3.1 Request

**Name of request:** searchTemplate

This operation searches for template packages using any combination of the metadata used for describing a template. See Section 3.3.1.1 of the Template Service Interface Logical Service Specification [[Template LSS](#)] for an explanation of how the search function behaves.

#### Inputs:

PCEHRHeader

#### searchTemplate

See searchTemplate section of the Template Service Interface Technical Service Specification [[Template TSS](#)] for the current list of the elements in the input, their data types, cardinality and the conformance requirements.

Table 52: *getTemplate* inputs

Inputs	Explanation	
searchTemplate	templateID	Optional OID identifying the template being searched for.
	templateMetaData	Optional Name / Value pairs specifying search criteria

The definitions and description of the metadata elements can be found in the Template Package Technical Specification [[Template PKG](#)].

The `searchTemplate` is executed to discover information about template packages stored within the Template Service. It returns all the metadata for templates matching the search request, as well as additional metadata defining the current

state of acceptance by the PCEHR System of documents conforming to the template.

The ability to “search” using a known Template Identifier is provided to allow a mechanism to obtain the metadata and PCEHR usage criteria for a template without the overhead of having to fetch the entire package (which can be quite large, even when restricted to machine usable components only).

Any clinical system or registered repository may execute a search to obtain template identification information and metadata. This may be used to:

1. Check whether or not a document can be submitted to the PCEHR System at this time.
2. Find alternate templates for a template which is no longer accepted by the PCEHR System.
3. Find “lower” conformance level templates for a document that does not meet the validation requirements for a desired conformance level, but may nevertheless be suitable for submission to the PCEHR System.

A clinical system which does not need to perform dynamic validation, but wants to check whether or not a document will be accepted by the PCEHR System, may use the `searchTemplate` request with a specific `templateId` in preference to the `getTemplate`, as the large quantity of data in the actual template package may not be needed.

When the PCEHR System ceases accepting documents conforming to a particular template, it is almost certain that a replacement template will exist. The best replacement template may not necessarily be referenced by the `templateSupersedingId` metadata item, as there may be several possible replacements. Using other metadata items to perform a search enables these template packages to be discovered if they exist.

A document which cannot be submitted to the PCEHR System, either because the template to which it conforms is no longer accepted by the PCEHR System, or because the document does not meet the validation criteria, may meet the validation criteria for another acceptable template, and be submitted to the PCEHR System asserting conformance to that alternate template. Searching using appropriate metadata elements will allow discovery of the potential templates to be assessed and used.

### Example

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
      http://ns.electronichealth.net.au/tplt/svc/SearchTemplate/1.1/SearchTemplatePortType/searchTemplateRequest
    </Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-0c27c6d9-d7cb-41dc-8917-c407ba306b55">
      <User>
        <IDType>HP11</IDType>
        <ID>8003619166674595</ID>
        <username>User1</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
    </h:PCEHRHeader>
  </s:Header>
  <s:Body>
    <searchTemplateRequest xmlns="http://ns.electronichealth.net.au/tplt/svc/SearchTemplate/1.1">
      <templateId>1</templateId>
    </searchTemplateRequest>
  </s:Body>
</s:Envelope>
```

```

<clientSystemType>CIS</clientSystemType>
<accessingOrganisation>
  <organisationID>8003620833337558</organisationID>
  <organisationName>Local Practice</organisationName>
  <alternateOrganisationName>Alternate Org Name</alternateOrganisationName>
</accessingOrganisation>
</h:PCEHRHeader>
<h:signature .....>
  .....
</h:signature>
  .....
<MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:31b6c8a4-fbb9-4b8f-9
9b2-69ed655e8c5d</MessageID>
  .....
</s:Header>
<s:Body xml:id="body-27af16b2-d36a-4786-a68a-e16b3da31b2f">
  <searchTemplate xmlns="http://ns.electronichealth.net.au/tp1t/xsd/interfaces/SearchTe
mplate/1.0">
    <templateID>1.2.36.1.2001.1006.1.16565.1</templateID>
  </searchTemplate>
</s:Body>
</s:Envelope>

```

### 9.3.2 Response

**Name of Response:** getTemplateResponse

#### Outputs

See getTemplateResponse section of the Template Service Interface Technical Service Specification [Template\_TSS] for the current list of the elements in the output, their data types, cardinality and the conformance requirements.

Table 53: getTemplateResponse elements

Outputs	Explanation
searchTemplateResponse	responseStatus
	Template

Table 54: Components of the responseStatus element

responseStatus elements	Explanation
code	Status code for the result of the transaction
description	Brief status description
details	Additional detail of the response

Table 55: template elements

template elements	Explanation
templateMetaData	Name / value pairs containing the metadata describing the template.
usageMetaData	PCEHRAcceptedStartDate
	The time after which documents asserting conformance to this template can be submitted to the PCEHR.

template elements	Explanation
PCEHRAcceptedEndDate	The time after which documents asserting conformance to this template will no longer be accepted by the PCEHR.
containsPCEHRAutomaticData	Any indicator that the PCEHR System will attempt to find atomic data within documents conforming to this template in order to cache for the construction of views for the PCEHR.

### Example

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>
      http://ns.electronichealth.net.au/tplt/svc/SearchTemplate/1.1/SearchTemplatePortType/searchTemplateResponse
    </wsa:Action>
    <wsa:MessageID>urn:uuid:81af0584-837a-489d-8336-82b29bd86833</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:31b6c8a4-fbb9-4b8f-99b2-69ed655e8c5d</wsa:RelatesTo>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <S:Body xmlns:S="http://www.w3.org/2003/05/soap-envelope" xml:id="Id-0001339996492028-e28639494fdeb94c05c90000-2">
    <ns:searchTemplateResponse xmlns:ns="http://ns.electronichealth.net.au/tplt/xsd/interfaces/SearchTemplate/1.0">
      <ns:responseStatus>
        <ns1:code xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">PCEHR_SUCCESS</ns1:code>
        <ns1:description xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">SUCCESS</ns1:description>
      </ns:responseStatus>
      <ns:template>
        <ns:templateMetadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateTypeCode</ns1:name>
            <ns1:value>60591-5</ns1:value>
          </ns1:metadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateTypeCodeSystem</ns1:name>
            <ns1:value>2.16.840.1.113883.6.1</ns1:value>
          </ns1:metadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateTypeCodeSystemName</ns1:name>
            <ns1:value>LOINC</ns1:value>
          </ns1:metadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateTypeCodeDisplayName</ns1:name>
            <ns1:value>Patient summary</ns1:value>
          </ns1:metadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateTypeTypeIdExtension</ns1:name>
            <ns1:value>POCD_HD000040</ns1:value>
          </ns1:metadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateTypeTypeIdRoot</ns1:name>
            <ns1:value>2.16.840.1.113883.1.3</ns1:value>
          </ns1:metadata>
          <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplateCoreElements/1.0">
            <ns1:name>TemplateAdministrator</ns1:name>

```

```

    <ns1:value>CKM</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateClass</ns1:name>
    <ns1:value>ClinicalDocument</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateConformanceLevel</ns1:name>
    <ns1:value>3A</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateCustodian</ns1:name>
    <ns1:value>Nehta</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateDescription</ns1:name>
    <ns1:value>
      Shared Health Summary clinical document - conformance level 3A
    </ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateDetailedDescription</ns1:name>
    <ns1:value>
      Template package for a PCEHR-conformant Shared Health Summary clinical docu
ment. Contains CDA implementation guide and schematrons for level 3A conformance checking
    </ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateFormatType</ns1:name>
    <ns1:value>CDA</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateFormatVersion</ns1:name>
    <ns1:value>2</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateID</ns1:name>
    <ns1:value>1.2.36.1.2001.1006.1.16565.1</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateKeyword</ns1:name>
    <ns1:value>CDA</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateKeyword</ns1:name>
    <ns1:value>Shared Health Summary</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateName</ns1:name>
    <ns1:value>Shared Health Summary</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateStatus</ns1:name>
    <ns1:value>Active</ns1:value>
  </ns1:metadata>
  <ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/Temp
latesCoreElements/1.0">
    <ns1:name>TemplateStatusEffectiveDate</ns1:name>
    <ns1:value>2012-05-31T00:00:00.000+10:00</ns1:value>
  </ns1:metadata>

```

```

</ns1:metadata>
<ns1:metadata xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">
  <ns1:name>TemplateVersion</ns1:name>
  <ns1:value>25</ns1:value>
</ns1:metadata>
</ns:templateMetadata>
<ns:usageMetadata>
  <ns1:PCEHRAcceptedStartDate xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">2011-12-27T00:00:00.000+11:00</ns1:PCEHRAcceptedStartDate>
  <ns1:PCEHRAcceptedEndDate xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">2020-12-27T00:00:00.000+11:00</ns1:PCEHRAcceptedEndDate>
  <ns1:containsPCEHRAtomcData xmlns:ns1="http://ns.electronichealth.net.au/tplt/xsd/common/TemplatesCoreElements/1.0">false</ns1:containsPCEHRAtomcData>
</ns:usageMetadata>
</ns:template>
</ns:searchTemplateResponse>
</S:Body>
</soap:Envelope>

```

## Error

There are two types of errors that may be returned by the PCEHR System:

- **Standard Error:** the PCEHR System will return this error when there is a Web Services Error as per ATS5820 specification during the transaction. This error will be returned as SOAP Fault. See [Appendix E](#).
- **Functional Error:** the PCEHR System will return this when there is a functional/business error during the transaction. This error will be returned in the *responseStatus* within the SOAP Body.

## Response Status Codes

Table 56: *getTemplateResponse* functional errors

Status Code	Description	Suggested action
PCEHR_SUCCESS	SUCCESS	The list of metadata for the matching templates can be processed.
PCEHR_ERROR_1802	No Search Item	Where a user interaction is occurring, a message should be displayed indicating that no results were found. The search may be re-tried with less restrictive search criteria to find results which may be excluded by the submitted search criteria.
PCEHR_ERROR_1803	Invalid Search criteria	Where a user interaction is occurring, a message should be displayed indicating that the search criteria is invalid. This may be due to user input within fields (such as invalid logical requests), or the supply of unknown values for the "name" parameters. The search may be retried with different criteria.
PCEHR_ERROR_1804	Too many results found to be returned	Where a user interaction is occurring, a message should be displayed indicating that too many results matched the search criteria, and they cannot be returned. The search may be retried with more restrictive search criteria to reduce the number of matching results.



# 10 Registration

## 10.1 Overview

The PCEHR Assisted Registration operation provides the ability, when inputting via a clinical information system, for individuals or their authorised representatives to register for a PCEHR by providing either a verified IHI number or a set of demographic details.

The registerPCEHR operation will also provide the ability to give, on behalf of a consumer, the mandatory acceptance of the PCEHR application and consent declaration and to give the optional consent to import automatically into the consumer's PCEHR all existing and future Medicare Benefits Schedule (MBS), Pharmaceutical Benefits Scheme (PBS), Australian Organ Donor Register (AODR) and Australian Childhood Immunisation Register (ACIR) Medicare documents.

## 10.2 registerPCEHR

### 10.2.1 Request

**Name of Request:** registerPCEHR

The registerPCEHR operation may be invoked to register a PCEHR for an individual or a dependent child.

In both cases, the identity will be matched by the PCEHR System using either the provided IHI number or by demographic details. Note that if the clientSystemType (in the PCEHR Header) is "CIS" (meaning Clinical Information System), then the IHI number **SHALL** be given.

Once this operation is invoked successfully, the individual will either be registered for a PCEHR or will receive an appropriate error message.

#### Inputs

**PCEHRHeader** (see section 4.4).

#### registerPCEHR

See registerPCEHR section of *PCEHR Registration Service Technical Service Specification* [[Registration TSS](#)] for the current list of the elements in the inputs, their data types, cardinality and the conformances.

Table 57: registerPCEHR inputs

Level 2 registerPCEHR Element	Level 3 Element	Level 4 Element	Level 5 Elements	Card	Explanation
				1..1	
	documentConsent			1..1	
		document		1..1	
			status	1..1	
			type	1..1	
	identity			1..1	
		evidenceOfIdentity	type	1..1	
		indigenousStatus		1..1	

Level 2 registerPC EHR Element	Level 3 Element	Level 4 Element	Level 5 Elements	Card	Explanation
	ivcCorrespondence			1..1	email   "sms"   "none"
		contactDetailsType		0..1	
			emailAddresses	1..1	
			mobilePhoneNumber	1..1	
		channel		1..1	
individual				1..1	
	demographicsType			1..1	
		militaryHealthNumber		0..1	
		date		1..1	
		sex	Enumeration	1..1	"F   I   M   N where: M=Male, F=Female, I=Intersex or Indeterminate N =Not specified."
		Name			
			conditionalUse	0..1	
			nameSuffix	0..1	"These are specified by Medicare and defined in the PCEHR_CommonTypes_Supplementary schema. A few examples: ESQ   JNR   SNR   OA   MP   MD"
			nameTitle	0..1	"These are specified by Medicare and defined in the PCEHR_CommonTypes_Supplementary schema. A few examples: MR   MRS   MS   DR   Nurse"
			preferred	0..1	
			usage	0..1	
			familyName	1..1	Individual surname
			givenName	1..1	Individual given names
		medicareCardNumber	Token	0..1	Individual Medicare Card Number
		medicareIRN	Integer	0..1	Individual Reference Number (minLength=1, maxLength=9)
		dvaFileNumber	Token	0..1	DVA File Number (minLength=2, maxLength=9)

Level 2 registerPC EHR Element	Level 3 Element	Level 4 Element	Level 5 Elements	Card	Explanation
representative					
	ihiNumber	String		1..1	minLength=16, maxLength=16
	demographicsType			0..1	
		medicareCardNumber	Token	0..1	Individual Medicare Card Number
		medicareIRN	Integer	0..1	Individual Reference Number (minLength=1, maxLength=9)
		dvaFileNumber	Token	0..1	DVA File Number (minLength=2, maxLength=9)
		militaryHealthNumber		0..1	
		date		0..1	
	sex		Enumeration	1..1	"F   I   M   N where: M=Male, F=Female, I=Intersex or Indeterminate N =Not specified."
	Name			1..1	
		givenName		1..1	Individual given names
		conditionalUse		0..1	
		preferred		0..1	
		usage		0..1	
		familyName		1..1	Individual surname
		nameTitle		0..1	"These are specified by Medicare and defined in the PCEHR_CommonTypes_Supplementary schema. A few examples: MR   MRS   MS   DR   Nurse"
		nameSuffix		0..1	"These are specified by Medicare and defined in the PCEHR_CommonTypes_Supplementary schema. A few examples: ESQ   JNR   SNR   OA   MP   MD"

### Example

This example request is for registering the evidence of identity (where most of the instances of SignatureValue and X509Certificate have been replaced with "....."):

```
<s:Envelope xmlns:a="http://www.w3.org/2005/08/addressing"
  xmlns:s="http://www.w3.org/2003/05/soap-envelope">
```

```

<s:Header>
  <a:Action s:mustUnderstand="1"
>http://ns.electronichealth.net.au/pcehr/svc/RegisterPCEHR/2.0/RegisterPCEHRPortType/regi
sterPCEHRRequest</a:Action>
  <h:PCEHRHeader
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xml:id="header-995f5d14-0b20-4534-b1ee-1669e04aaf96">
  <User>
    <IDType>LocalSystemIdentifier</IDType>
    <ID>pwilford</ID>
    <username>JoeBloggs</username>
    <useRoleForAudit>>false</useRoleForAudit>
  </User>
  <ihiNumber>8003608833364953</ihiNumber>
  <productType>
    <vendor>NEHTA</vendor>
    <productName>Test Harness</productName>
    <productVersion>1.0</productVersion>
    <platform>Windows 7</platform>
  </productType>
  <clientSystemType>CIS</clientSystemType>
  <accessingOrganisation>
    <organisationID>8003624166667177</organisationID>
    <organisationName>Medicare-305</organisationName>
  </accessingOrganisation>
  </h:PCEHRHeader>
  <h:timestamp
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
  xml:id="timestamp-cd010d1e-5538-47e5-96ef-2ff2020acd9c">
    <created>2013-05-13T23:43:58.7978539Z</created>
  </h:timestamp>
  <a:MessageID>urn:uuid:b7ae9e2b-c314-42bc-a31e-06fbe97a356b</a:MessageID>
  <a:ReplyTo>
    <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
  </a:ReplyTo>
  <a:From>
    <a:Address>http://www.w3.org/2005/08/addressing/anonymous</a:Address>
  </a:From>
  <a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"
  xml:id="body-dd9dfb44-de68-4b8a-8ee5-05ad1d88a31a">
  <registerPCEHR
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/RegisterPCEHR/2.0">
  <assertions>
    <identity>
      <evidenceOfIdentity>
        <type>IdentityVerificationMethod2</type>
      </evidenceOfIdentity>
      <indigenousStatus>4</indigenousStatus>
    </identity>
    <ivcCorrespondence>
      <channel>email</channel>
      <contactDetails>
        <emailAddress
xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0"
          >nehta@nehta.gov.au</emailAddress>
        </contactDetails>
      </ivcCorrespondence>
      <acceptedTermsAndConditions>true</acceptedTermsAndConditions>

```

```

    </assertions>
  </registerPCEHR>
</s:Body>
</s:Envelope>

```

### Coding Tips

The published schema PCEHR\_RegisterPCEHR.xds defines the `child` element using a choice wrapper; choice is not currently supported with .NET clients.

The recommended workaround is to add the following lines of code:

```

inValue.registerPCEHR.child = new registerPCEHRChild();
    var a = new registerPCEHRChildDemographics { dateOfBirth = DateTime.Now.Date,
dvaFileNumber = "123123" };
    inValue.registerPCEHR.child.Item = a;

```

This method will then allow handling of the following message sample:

```

<child>
  <demographics>
    <sex xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">M</sex>
    <dateOfBirth xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">2012-06-05</dateOfBirth>
    <dvaFileNumber xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">123123</dvaFileNumber>
  </demographics>
</child>

```

And the following method will handle the child's IHI number:

```

inValue.registerPCEHR.child = new registerPCEHRChild();
inValue.registerPCEHR.child.Item = IHICChild;

```

This would allow handling of the following message sample code:

```

<child>
  <ihiNumber xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">8003601243017717</ihiNumber>
</child>

```

## 10.2.2 Response

**Name of Response:** registerPCEHRRResponse

### Outputs

See registerPCEHRRResponse section of *PCEHR Registration Service Technical Service Specification* for the current list of the elements in the outputs, their data types, cardinality and the conformance.

Table 58: registerPCEHRRResponse elements

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
registerPCEHRRResponse			1..1	
	ResponseStatus		1..1	
		code	1..1	Status Code for the result of the transaction

Level 1 Element	Level 2 Element	Level 3 Element	Card	Explanation
		description	1..1	Brief status description
		details	0..1	Additional detail of the response

**Web Service Errors:** see [Appendix E](#).

*Table 59: registerPCEHRResponse functional errors*

Code	Description
PCEHR_SUCCESS	SUCCESS
PCEHR_ERROR_9001	Identity has not been verified by provider
PCEHR_ERROR_9002	Invalid terms and conditions version
PCEHR_ERROR_9003	The latest terms and conditions have not been accepted
PCEHR_ERROR_9004	IVC communication method has not been specified
PCEHR_ERROR_9005	Invalid IVC communication method
PCEHR_ERROR_9006	Medicare consent has not been specified
PCEHR_ERROR_9007	Parent declaration is required for parent-child registration
PCEHR_ERROR_9008	Individual PCEHR already exists
PCEHR_ERROR_9009	Child PCEHR already exists
PCEHR_ERROR_9010	Individual cannot be less than 14 years of age
PCEHR_ERROR_9011	Parent and child must be on the same Medicare card
PCEHR_ERROR_9012	Child cannot be older than 18 years of age
PCEHR_ERROR_9013	There must be a 14-year age gap between parent and child
PCEHR_ERROR_9014	Registration successful – IVC correspondence will be delayed. Please contact System Administrator if required urgently
PCEHR_ERROR_5006	No unique active IHI found
PCEHR_ERROR_0101	Invalid family name
PCEHR_ERROR_0102	Invalid given name
PCEHR_ERROR_0103	The birth year must not be less than 1800
PCEHR_ERROR_0104	The date of birth must not be in the future
PCEHR_ERROR_0105	Invalid mobile phone number
PCEHR_ERROR_0106	Invalid email address
PCEHR_ERROR_0107	Invalid Medicare card number
PCEHR_ERROR_0108	Invalid Medicare IRN
PCEHR_ERROR_0109	Invalid DVA file number
PCEHR_ERROR_0110	Invalid military health number
PCEHR_ERROR_0111	Invalid postcode
PCEHR_ERROR_0112	Invalid suburb
PCEHR_ERROR_0113	Invalid combinations of state, postcode and suburb

Code	Description
PCEHR_ERROR_0114	Postal Delivery Number is mandatory when Postal Delivery Type Code is entered, unless Postal Delivery Type Code is Care PO, CMA or CMB
PCEHR_ERROR_0115	If Unit Type is present, Unit Number must be keyed
PCEHR_ERROR_0116	If Level Type is present, Level Number must be keyed
PCEHR_ERROR_0117	Invalid unit number
PCEHR_ERROR_0118	Invalid address site name
PCEHR_ERROR_0119	Invalid level number
PCEHR_ERROR_0120	Invalid street number
PCEHR_ERROR_0121	Invalid lot number
PCEHR_ERROR_0122	Invalid street name
PCEHR_ERROR_0123	Invalid postal delivery number
PCEHR_ERROR_0124	Either street number or lot number required for an Australian address
PCEHR_ERROR_0125	Only one of lot number or street number required for an Australian address
PCEHR_ERROR_0126	If the country is Australia, you cannot enter InternationalAddressLine, InternationalStateProvince, InternationalPostcode
PCEHR_ERROR_0127	Invalid IHI status
PCEHR_ERROR_0128	Invalid IHI verification status
PCEHR_ERROR_0129	Invalid IHI record status
PCEHR_ERROR_0130	Invalid date effective
PCEHR_ERROR_0131	Invalid ID type
PCEHR_ERROR_0132	Invalid ID number
PCEHR_ERROR_0133	Invalid state
PCEHR_ERROR_0134	Invalid sex
PCEHR_ERROR_0135	Invalid date of birth

### Example

This is the response for registering an individual (where most of the instances of SignatureValue and X509Certificate have been replaced with "....."):

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-
envelope" xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements
/1.0" xmlns:xd="http://www.w3.org/2000/09/xmldsig#" xmlns:ns1="http://ns.electronichealth
.net.au/pcehr/xsd/interfaces/RegisterPCEHR/1.0">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/RegisterPCEHR/1.0/RegisterPCEHRPo
rtType/Fault/standardError
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001337306478736-81dce6cb4fb5ad6e2cd90000-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">uuid:b162d8bf-
2ee6-432e-a187-502ca15842d0</wsa:RelatesTo>
    <ns:signature xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/Common
CoreElements/1.0">
      <dsig:Signature xmlns:dsig="http://www.w3.org/2000/09/xmldsig#" Id="Id-
```

```

0001337306720174-43c891f24fb5ae600b990000-3">
  <dsig:SignedInfo>
    <dsig:CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml
-exc-c14n#" />
    <dsig:SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rs
a-sha1" />
    <dsig:Reference URI="#Id-0001337306720174-43c891f24fb5ae600b990000-
2">
      <dsig:DigestMethod Algorithm="http://www.w3.org/2000/09/xmldsig#s
ha1" />
      <dsig:DigestValue>/TedPAS1FY4pQlCboJ4idvPKU68=</dsig:DigestValue>
    </dsig:Reference>
  </dsig:SignedInfo>
  <dsig:SignatureValue>
    .....SyUEw==
  </dsig:SignatureValue>
  <dsig:KeyInfo Id="Id-0001337306720174-43c891f24fb5ae600b990000-4">
    <dsig:X509Data>
      <dsig:X509Certificate>
        MIIFg..... pufK1t
      </dsig:X509Certificate>
    </dsig:X509Data>
  </dsig:KeyInfo>
</dsig:Signature>
</ns:signature>
</soap:Header>
<soap:Body xml:id="Id-d8f2d8e6-539d-47be-bac3-6d1c74284619-1">
  <ns1:registerPCEHRResponse>
    <ns1:responseStatus>
      <ns:code>PCEHR_SUCCESS</ns:code>
      <ns:description>SUCCESS</ns:description>
    </ns1:responseStatus>
  </ns1:registerPCEHRResponse>
</soap:Body>
</soap:Envelope>

```

## Example

This is the response for registering a child.

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-
envelope" xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements
/1.0" xmlns:ns1="http://ns.electronichealth.net.au/pcehr/xsd/interfaces/RegisterPCEHR/1.0
">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">
      http://ns.electronichealth.net.au/pcehr/svc/RegisterPCEHR/1.0/RegisterPCEHRPo
rtType/Fault/standardError
    </wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001337306478736-81dce6cb4fb5ad6e2cd90000-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">uuid:b162d8bf-
2ee6-432e-a187-502ca15842d0</wsa:RelatesTo>
    <ns:signature xmlns:ns="http://ns.electronichealth.net.au/pcehr/xsd/common/Common
CoreElements/1.0">
      <dsig:Signature xmlns:dsig="http://www.w3.org/2000/09/xmldsig#" Id="Id-
0001337306720174-43c891f24fb5ae600b990000-3">
        <dsig:SignedInfo>
          <dsig:CanonicalizationMethod Algorithm="http://www.w3.org/2001/10/xml
-exc-c14n#" />
          <dsig:SignatureMethod Algorithm="http://www.w3.org/2000/09/xmldsig#rs
a-sha1" />
          <dsig:Reference URI="#Id-0001337306720174-43c891f24fb5ae600b990000-
2">
            <dsig:DigestMethod Algorithm="http://www.w3.org/2000/09/xmldsig#s
ha1" />
            <dsig:DigestValue>/TedPAS1FY4pQlCboJ4idvPKU68=</dsig:DigestValue>
          </dsig:Reference>
        </dsig:SignedInfo>

```



```
<dsig:SignatureValue>
  Lvk9iFg.....yUEw==
</dsig:SignatureValue>
<dsig:KeyInfo Id="Id-0001337306720174-43c891f24fb5ae600b990000-4">
  <dsig:X509Data>
    <dsig:X509Certificate>
      MIFg.....ZYIJ1OpufK1t
    </dsig:X509Certificate>
  </dsig:X509Data>
</dsig:KeyInfo>
</dsig:Signature>
</ns:signature>
</soap:Header>
<soap:Body>
  <ns1:registerPCEHRResponse>
    <ns1:responseStatus>
      <ns:code>PCEHR_SUCCESS</ns:code>
      <ns:description>SUCCESS</ns:description>
    </ns1:responseStatus>
  </ns1:registerPCEHRResponse>
</soap:Body>
</soap:Envelope>
```

# Appendix A Class and Type Codes

<b>Coding System</b>	<b>Class Code</b>	<b>FormatCode</b>	<b>OID</b>	<b>ClassCode DisplayName</b>	<b>TypeCodeDisplay Name</b>
LOINC	60591-5	1.2.36.1.2001.1006.1.16565.*		Patient Summary	Shared Health Summary (2, 3A, 3B)
LOINC	57133-1	1.2.36.1.2001.1006.1.21000.*		Referral note	e-Referral (1A, 1B, 2, 3A)
LOINC	51852-2	1.2.36.1.2001.1006.1.16615.*		Letter	Specialist Letter (1A, 1B, 2, 3A, 3B)
LOINC	18842-5	1.2.36.1.2001.1006.1.20000.*		Discharge Summarisation Note	Discharge Summary (1A, 1B, 3A, 3B)
LOINC	34133-9	1.2.36.1.2001.1006.1.16473.*		Summarisation of episode note	Event Summary (3A)
NCTIS	100.16650	1.2.36.1.2001.1006.1.16650.*		Pharmaceutical Benefits Report	Pharmaceutical Benefits Report
NCTIS	100.16671	1.2.36.1.2001.1006.1.16671.*		Australian Organ Donor Register	Australian Organ Donor Register
NCTIS	100.16659	1.2.36.1.2001.1006.1.16659.*		Australian Childhood Immunisation Register	Australian Childhood Immunisation Register
NCTIS	100.16644	1.2.36.1.2001.1006.1.16644.*		Medicare/DVA Benefits Report	Medicare/DVA Benefits Report
NCTIS	100.16681	1.2.36.1.2001.1006.1.16681.*		Consumer Entered Notes	Consumer Entered Notes (3A)
NCTIS	100.16685	1.2.36.1.2001.1006.1.16685.*		Consumer Entered Health Summary	Consumer Entered Health Summary (3A)
NCTIS	100.16696	1.2.36.1.2001.1006.1.16696.*		Advance Care Directive Custodian Record	Advance Care Directive Custodian Record
NCTIS	100.16764	1.2.36.1.2001.1006.1.170.*		PCEHR Prescription Record	PCEHR Prescription Record
NCTIS	100.16765	1.2.36.1.2001.1006.1.171.*		PCEHR Dispense Record	PCEHR Dispense Record
NCTIS	100.16812	1.2.36.1.2001.1006.1.183.*		Consumer entered achievements	Consumer entered achievements (3A)
NCTIS	100.16870	1.2.36.1.2001.1006.1.208.*		Consumer Entered Measurements	Consumer Entered Measurements (3A)
NCTIS	100.16919	1.2.36.1.2001.1006.1.215.*		Child Parent Questionnaire	Child Parent Questionnaire (3A)
NCTIS	100.16920	1.2.36.1.2001.1006.1.216.*		Health Check Assessment	Health Check Assessment (3A)

The latest formatCode OIDs can be retrieved from the Template Service. The last digit (\*) will vary depending on the CDA Level and version.

## Appendix B Stored Query IDs

Query Name	Query ID
FindDocuments	urn:uuid:14d4debf-8f97-4251-9a74-a90016b0af0d
FindSubmissionSets	urn:uuid:f26abbcb-ac74-4422-8a30-edb644bbc1a9
GetDocuments	urn:uuid:5c4f972b-d56b-40ac-a5fcc8ca9b40b9d4
GetFolders	urn:uuid:5737b14c-8a1a-4539-b659-e03a34a5e1e4
GetAssociations	urn:uuid:a7ae438b-4bc2-4642-93e9-be891f7bb155
GetDocumentsAndAssociations	urn:uuid:bab9529a-4a10-40b3-a01ff68a615d247a
GetSubmissionSets	urn:uuid:51224314-5390-4169-9b91-b1980040715a
GetSubmissionSetAndContents	urn:uuid:e8e3cb2c-e39c-46b9-99e4-c12f57260b83
GetRelatedDocuments	urn:uuid:d90e5407-b356-4d91-a89f-873917b4b0e6

# Appendix C Object IDs

Public Constant String	ID
<b>RegistryObject</b>	
XDS_REGISTRY_PACKAGE	urn:oasis:names:tc:ebxml regrep:ObjectType:RegistryObject:RegistryPackage
XDS_CLASSIFICATION	urn:oasis:names:tc:ebxml regrep:ObjectType:RegistryObject:Classification
XDS_EXTERNAL_IDENTIFIER	urn:oasis:names:tc:ebxml regrep:ObjectType:RegistryObject:ExternalIdentifier
XDS_ASSOCIATION	urn:oasis:names:tc:ebxml regrep:ObjectType:RegistryObject:Association
<b>XDSSubmissionSet</b>	
XDS_SUBMISSION_SET	urn:uuid:a54d6aa5 d40d 43f9 88c5 b4633d873bdd ClassificationNode R/R
XDS_SUBMISSION_SET_AUTHOR	urn:uuid:a7058bb9 b4e4 4307 ba5b e3f0ab85e12d External Classification Scheme R2/R
XDS_SUBMISSION_SET_CONTENT_TYPE_CODE	urn:uuid:aa543740 bdda 424e 8c96 df4873be8500 External Classification Scheme R/R
XDS_SUBMISSION_SET_UNIQUE_ID	urn:uuid:96fdda7c d067 4183 912e bf5ee74998a8 External Identifier R/R
XDS_SUBMISSION_SET_SOURCE_ID	urn:uuid:554ac39e e3fe 47fe b233 965d2a147832 External Identifier R/R
XDS_SUBMISSION_SET_PATIENT_ID	urn:uuid:6b5aea1a 874d 4603 a4bc 96a0a7b38446 External Identifier R/R
<b>XDSDocumentEntry</b>	
XDS_DOCUMENT_ENTRY	urn:uuid:7edca82f 054d 47f2 a032 9b2a5b5186c1 ClassificationNode R/R
XDS_DOCUMENT_ENTRY_AUTHOR	urn:uuid:93606bcf 9494 43ec 9b4e a7748d1a838d External Classification Scheme R2/R
XDS_DOCUMENT_ENTRY_CLASS_CODE	urn:uuid:41a5887f 8865 4c09 adf7 e362475b143a External Classification Scheme R/R
XDS_DOCUMENT_ENTRY_CONFIDENTIALITY_CODE	urn:uuid:f4f85eac e6cb 4883 b524 f2705394840f External Classification Scheme R/P
XDS_DOCUMENT_ENTRY_EVENT_CODE_LIST	urn:uuid:2c6b8cb7 8b2a 4051 b291 b1ae6a575ef4 External Classification Scheme O/R
XDS_DOCUMENT_ENTRY_FORMAT_CODE	urn:uuid:a09d5840 386c 46f2 b5ad 9c3699a4309d External Classification Scheme R/R
XDS_DOCUMENT_ENTRY_HEALTHCARE_FACILITY_TYPE_CODE	urn:uuid:f33fb8ac 18af 42cc ae0e ed0b0bdb91e1 External Classification Scheme R/R
XDS_DOCUMENT_ENTRY_PATIENT_ID	urn:uuid:58a6f841 87b3 4a3e 92fd a8ffeff98427 ExternalIdentifier R/R
XDS_DOCUMENT_ENTRY_PRACTICE_SETTING_CODE	urn:uuid:ccc5598 8b07 4b77 a05e ae952c785ead External Classification Scheme R/R

<b>Public Constant String</b>	<b>ID</b>
XDS_DOCUMENT_ENTRY_TYPE_CODE	urn:uuid:f0306f51 975f 434e a61c c59651d33983 External Classification Scheme R/R
XDS_DOCUMENT_ENTRY_UNIQUE_ID	urn:uuid:2e82c1f6 a085 4c72 9da3 8640a32e42ab ExternalIdentifier R/R
Association Type	
XDS_ASSOCIATION_TYPE_HAS_MEMBER	urn:oasis:names:tc:ebxml regrep:AssociationType:HasMember
XDS_ASSOCIATION_TYPE_APND	urn:ihe:iti:2007:AssociationType:APND
XDS_ASSOCIATION_TYPE_RPLC	urn:ihe:iti:2007:AssociationType:RPLC
XDS_ASSOCIATION_TYPE_XFRM	urn:ihe:iti:2007:AssociationType:XFRM
XDS_ASSOCIATION_TYPE_XFRM_RPLC	urn:ihe:iti:2007:AssociationType:XFRM_RPLC
XDS_ASSOCIATION_TYPE_SIGNS	urn:ihe:iti:2007:AssociationType:signs
XDS_ASSOCIATION_TYPE_UPDATE_AVAILABILITY_STATUS	urn:ihe:iti:2010:AssociationType:UpdateAvailabilityStatus
XDS_ASSOCIATION_TYPE_HAS_MEMBER	urn:oasis:names:tc:ebxml regrep:AssociationType:HasMember

# Appendix D XDS Value Sets

## D.1 XSDocumentEntry

The XSDocumentEntry values can be mainly populated from details within the CDA document. The few other fields would generally be fixed by the vendor during development, or at least configurable to set them at installation time.

Field	Description	Xpath in CDA document
author:authorInstitution	Author Org HPIO	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/ext:asEmployment/ext:employerOrganization/cda:asOrganizationPartOf/cda:wholeOrganization/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='HPIO']/@root
author:authorPerson	Author HPII	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='HPII']/@root
	Author Family Name	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/cda:name/family
	Author Given Name	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/cda:name/given[1]
	Author Prefix	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/cda:name/prefix
classCode	Document Type	/cda:ClinicalDocument/cda:code/@code
classCodeDisplayName	(See <a href="#">Appendix A</a> )	/cda:ClinicalDocument/cda:code/@displayName
confidentialityCode	Fixed: "NA"	/cda:ClinicalDocument/cda:confidentialityCode/@nullFlavor
creationTime	Document Creation Time (without the timezone element)	/cda:ClinicalDocument/cda:effectiveTime/@value
entryUUID	Fixed: "DOCUMENT_SYMBOLICID_01"	PCEHR System Generates this UUID when it receives the request
formatCode	Supplied by Template Service to come	
formatCodeDisplayName	Supplied by Template Service to come	
hash	Only for ITI 42	
healthcareFacilityTypeCode	See CDA packaging spec	
healthcareFacilityTypeCodeDisplayName	See CDA packaging spec	
languageCode	(See Table 2 of the <a href="#">DEX TSS</a> ) Recommended value=" en-AU"	/cda:ClinicalDocument/cda:languageCode/@code

Field	Description	Xpath in CDA document
contentType	attachment type	application/zip
patientId	IHI Number	/cda:ClinicalDocument/cda:recordTarget/cda:patientRole/cda:patient/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='IHI']/@root
practiceSettingCode	See CDA packaging spec.	
practiceSettingCodeDisplayName	See CDA packaging spec.	
repositoryUniqueId		PCEHR System will set this value
serviceStartTime	In UTC format. In Discharge Summaries the convention is now that this represents the admittance date of the individual	/cda:ClinicalDocument/cda:effectiveTime/@value
serviceStopTime	See CDA packaging spec. In UTC format. In Discharge Summaries the convention is now that this represents the discharge date of the individual	/cda:ClinicalDocument/cda:effectiveTime/@value
Size	Only for ITI 42	
sourcePatientId	IHI Number	/cda:ClinicalDocument/cda:recordTarget/cda:patientRole/cda:patient/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='IHI']/@root
Title	Document Title	/cda:ClinicalDocument/cda:title
typeCode	Document Type	/cda:ClinicalDocument/cda:code/@code
typeCodeDisplayName	(See <a href="#">Appendix A</a> )	/cda:ClinicalDocument/cda:code/@displayName
uniqueId	Document Unique Id	/cda:ClinicalDocument/cda:id/@root and then convert to 2.25.N where N is a decimal form of the UUID /cda:ClinicalDocument/cda:id/@extension add this to end of OID if exists oid^extension

### D.1.1 Example of Amending a Document

Example of a document being amended with a *ProvideAndRegisterDocumentRequest*.

```
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">urn:ihe:iti:2007:ProvideAndRegisterDocumentSet-b</Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-99a7dad6-b5d1-4a24-857c-85e297e3289b">
```



```

<User>
  <IDType>HP11</IDType>
  <ID>8003614166668846</ID>
  <username>John Doe</username>
  <useRoleForAudit>false</useRoleForAudit>
</User>
<ihiNumber>8003601243017717</ihiNumber>
<productType>
  <vendor>Oracle</vendor>
  <productName>dummyCISusr1</productName>
  <productVersion>dummyCISusrV1</productVersion>
  <platform>Windows XP</platform>
</productType>
<clientSystemType>CIS</clientSystemType>
<accessingOrganisation>
  <organisationID>8003620833337558</organisationID>
  <organisationName>Local Practice</organisationName>
</accessingOrganisation>
</h:PCEHRHeader>
<h:signature .....>
</h:signature>
.....
<MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:1cealb32-2968-4fa8-9
a56-fc08ab7b0cfa</MessageID>
.....
</s:Header>
<s:Body xml:id="body-14f57ac5-ec40-4b8f-ac0c-2b64c6b49f00">
  <ProvideAndRegisterDocumentSetRequest xmlns="urn:ihe:iti:xds-b:2007">
    <SubmitObjectsRequest xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:lcm:3.0">
      <RegistryObjectList xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0">
        <ExtrinsicObject mimeType="application/zip" objectType="urn:uuid:7edca82f-054d-
47f2-a032-9b2a5b5186c1" id="DOCUMENT_SYMBOLICID_01">
          <Slot name="creationTime">
            <ValueList>
              <Value>201112011100</Value>
            </ValueList>
          </Slot>
          <Slot name="languageCode">
            <ValueList>
              <Value>en-AU</Value>
            </ValueList>
          </Slot>
          <Slot name="serviceStartTime">
            <ValueList>
              <Value>201112011100</Value>
            </ValueList>
          </Slot>
          <Slot name="sourcePatientId">
            <ValueList>
              <Value>8003601243017717^^^&#amp;#amp;1.2.36.1.2001.1003.0&#amp;#amp;ISO</Value>
            </ValueList>
          </Slot>
          <Name>
            <LocalizedString value="Shared Health Summary"/>
          </Name>
          <Classification nodeRepresentation="" classifiedObject="DOCUMENT_SYMBOLICID_0
1" classificationScheme="urn:uuid:93606bcf-9494-43ec-9b4e-a7748d1a838d" id="c101">
            <Slot name="authorInstitution">
              <ValueList>
                <Value>
                  Bodalla Clinic^^^^^^^^^1.2.36.1.2001.1003.0.8003620833337558
                </Value>
              </ValueList>
            </Slot>
            <Slot name="authorPerson">
              <ValueList>
                <Value>
                  ^Bagshaw^Todd^^^Dr.^^^&#amp;#amp;1.2.36.1.2001.1003.0.8003614166668846&#amp;#amp;
;ISO
                </Value>
              </ValueList>
            </Slot>

```

```

    </Classification>
    <Classification nodeRepresentation="60591-5" classifiedObject="DOCUMENT_SYMBOLICID_01" classificationScheme="urn:uuid:41a5887f-8865-4c09-adf7-e362475b143a" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c102">
      <Slot name="codingScheme">
        <ValueList>
          <Value>LOINC</Value>
        </ValueList>
      </Slot>
      <Name>
        <LocalizedString value="Patient Summary"/>
      </Name>
    </Classification>
    <Classification nodeRepresentation="1.3.6.1.4.1.21367.2006.7.101" classifiedObject="DOCUMENT_SYMBOLICID_01" classificationScheme="urn:uuid:f4f85eac-e6cb-4883-b524-f2705394840f" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c103">
      <Slot name="codingScheme">
        <ValueList>
          <Value>PCEHR_DocAccessLevels</Value>
        </ValueList>
      </Slot>
      <Name>
        <LocalizedString value="NA"/>
      </Name>
    </Classification>
    <Classification nodeRepresentation="1.2.36.1.2001.1006.1.16565.1" classifiedObject="DOCUMENT_SYMBOLICID_01" classificationScheme="urn:uuid:a09d5840-386c-46f2-b5ad-9c3699a4309d" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c104">
      <Slot name="codingScheme">
        <ValueList>
          <Value>PCEHR_FormatCodes</Value>
        </ValueList>
      </Slot>
      <Name>
        <LocalizedString value="SHS"/>
      </Name>
    </Classification>
    <Classification nodeRepresentation="8401" classifiedObject="DOCUMENT_SYMBOLICID_01" classificationScheme="urn:uuid:f33fb8ac-18af-42cc-ae0e-ed0b0bdb91e1" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c105">
      <Slot name="codingScheme">
        <ValueList>
          <Value>ANZSIC</Value>
        </ValueList>
      </Slot>
      <Name>
        <LocalizedString value="Hospitals (except Psychiatric Hospitals)"/>
      </Name>
    </Classification>
    <Classification nodeRepresentation="8401-6" classifiedObject="DOCUMENT_SYMBOLICID_01" classificationScheme="urn:uuid:cccf5598-8b07-4b77-a05e-ae952c785ead" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c106">
      <Slot name="codingScheme">
        <ValueList>
          <Value>ANZSIC</Value>
        </ValueList>
      </Slot>
      <Name>
        <LocalizedString value="Hospital (except psychiatric or veterinary hospitals)"/>
      </Name>
    </Classification>
    <Classification nodeRepresentation="60591-5" classifiedObject="DOCUMENT_SYMBOLICID_01" classificationScheme="urn:uuid:f0306f51-975f-434e-a61c-c59651d33983" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c107">
      <Slot name="codingScheme">
        <ValueList>
          <Value>LOINC</Value>
        </ValueList>
      </Slot>

```

```

    <Name>
      <LocalizedString value="Patient Summary"/>
    </Name>
  </Classification>
  <ExternalIdentifier value="8003601243017717^^^&1.2.36.1.2001.1003.0&I
SO" identificationScheme="urn:uuid:58a6f841-87b3-4a3e-92fd-a8ffeff98427" registryObject="
DOCUMENT_SYMBOLICID_01" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryOb
ject:ExternalIdentifier" id="ei01">
    <Name>
      <LocalizedString value="XDSDocumentEntry.patientId"/>
    </Name>
  </ExternalIdentifier>
  <ExternalIdentifier value="2.25.90470917415813857895338927936199782161" ident
ificationScheme="urn:uuid:2e82c1f6-a085-4c72-9da3-8640a32e42ab" registryObject="DOCUMENT_
SYMBOLICID_01" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Exte
rnalIdentifier" id="ei02">
    <Name>
      <LocalizedString value="XDSDocumentEntry.uniqueId"/>
    </Name>
  </ExternalIdentifier>
</ExtrinsicObject>
<RegistryPackage objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:Registr
yObject:RegistryPackage" id="SUBSET_SYMBOLICID_01">
  <Slot name="submissionTime">
    <ValueList>
      <Value>20120625151337</Value>
    </ValueList>
  </Slot>
  <Classification nodeRepresentation="" classifiedObject="SUBSET_SYMBOLICID_01"
classificationScheme="urn:uuid:a7058bb9-b4e4-4307-ba5b-e3f0ab85e12d" id="c108">
    <Slot name="authorInstitution">
      <ValueList>
        <Value>
          Bodalla Clinic^^^^^^^^^1.2.36.1.2001.1003.0.8003620833337558
        </Value>
      </ValueList>
    </Slot>
    <Slot name="authorPerson">
      <ValueList>
        <Value>
          ^Bagshaw^Todd^^^Dr.^^^&1.2.36.1.2001.1003.0.8003614166668846&amp
;ISO
        </Value>
      </ValueList>
    </Slot>
  </Classification>
  <Classification nodeRepresentation="60591-5" classifiedObject="SUBSET_SYMBOLI
CID_01" classificationScheme="urn:uuid:aa543740-bdda-424e-8c96-df4873be8500" objectType="
urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Classification" id="c109">
    <Slot name="codingScheme">
      <ValueList>
        <Value>LOINC</Value>
      </ValueList>
    </Slot>
  <Name>
    <LocalizedString value="Patient Summary"/>
  </Name>
</Classification>
  <ExternalIdentifier value="2.25.90470917415813857895338927936199782161" ident
ificationScheme="urn:uuid:96fdda7c-d067-4183-912e-bf5ee74998a8" registryObject="SUBSET_SY
MBOLICID_01" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Extern
alIdentifier" id="ei03">
    <Name>
      <LocalizedString value="XDSSubmissionSet.uniqueId"/>
    </Name>
  </ExternalIdentifier>
  <ExternalIdentifier value="1.2.36.1.2001.1003.0.8003620833337558" identificat
ionScheme="urn:uuid:554ac39e-e3fe-47fe-b233-965d2a147832" registryObject="SUBSET_SYMBOLIC
ID_01" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:ExternalIden
tifier" id="ei04">
    <Name>
      <LocalizedString value="XDSSubmissionSet.sourceId"/>
    </Name>
  </ExternalIdentifier>
</RegistryPackage>

```

```

    </Name>
  </ExternalIdentifier>
  <ExternalIdentifier value="8003601243017717^^^&1.2.36.1.2001.1003.0&ISO"
  identificationScheme="urn:uuid:6b5aea1a-874d-4603-a4bc-96a0a7b38446" registryObject="
  SUBSET_SYMBOLICID_01" objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObje
  ct:ExternalIdentifier" id="ei05">
    <Name>
      <LocalizedString value="XDSSubmissionSet.patientId"/>
    </Name>
  </ExternalIdentifier>
</RegistryPackage>
<Classification classificationNode="urn:uuid:a54d6aa5-d40d-43f9-88c5-b4633d873b
dd" classifiedObject="SUBSET_SYMBOLICID_01" objectType="urn:oasis:names:tc:ebxml-regrep:O
bjectType:RegistryObject:Classification" id="cl10"/>
  <Association targetObject="DOCUMENT_SYMBOLICID_01" sourceObject="SUBSET_SYMBOLI
  CID_01" associationType="urn:oasis:names:tc:ebxml-regrep:AssociationType:HasMember" objec
  tType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Association" id="as01">
    <Slot name="SubmissionSetStatus">
      <ValueList>
        <Value>Original</Value>
      </ValueList>
    </Slot>
  </Association>
  <Association targetObject="urn:uuid:5757af9d-2e97-4eba-a675-d1da787e29f6" sourc
  eObject="DOCUMENT_SYMBOLICID_01" associationType="urn:ihe:iti:2007:AssociationType:RPLC"
  objectType="urn:oasis:names:tc:ebxml-regrep:ObjectType:RegistryObject:Association" id="as
  02">
    <Name>
      <LocalizedString value="Replace Document"/>
    </Name>
  </Association>
</RegistryObjectList>
</SubmitObjectsRequest>
<Document id="DOCUMENT_SYMBOLICID_01">
  UEsDBBQ.....ch0AAAAA
</Document>
</ProvideAndRegisterDocumentSetRequest>
</s:Body>
</s:Envelope>

```

## D.2 XDSSubmissionSet

The XDSSubmissionSet values can be fully populated from details within the CDA document.

Field	Description	Xpath in CDA document
author:authorInsti tution	Author Org HPIO	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assigned Person/ext:asEmployment/ext:employerOrganization/cda:asOrganiz ationPartOf/cda:wholeOrganization/ext:asEntityIdentifier[@classCod e='IDENT']/ext:id[@assigningAuthorityName='HPI O']/@root
author:authorPerso n	Author HPII	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assigned Person/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigni ngAuthorityName='HPI I']/@root
	Author Family Name	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assigned Person/cda:name/family
	Author Given Name	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assigned Person/cda:name/given[1]
	Author Prefix	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assigned Person/cda:name/prefix
contentTypeCode	Document Type (See <a href="#">Table 8</a> )	/cda:ClinicalDocument/cda:code/@code

Field	Description	Xpath in CDA document
contentTypeCodeDisplay Name	Document Type Description	/cda:ClinicalDocument/cda:code/@displayName
entryUUID	Fixed: "SUBSET_SYMBOLIC CID_01"	[PCEHR Generates UUID when receives document]
patientId	IHI Number	/cda:ClinicalDocument/cda:recordTarget/cda:patientRole/cda:patient/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='IHI']/@root
sourceId	Author Org HPIO	/cda:ClinicalDocument/cda:author/cda:assignedAuthor/cda:assignedPerson/ext:asEmployment/ext:employerOrganization/cda:asOrganizationPartOf/cda:wholeOrganization/ext:asEntityIdentifier[@classCode='IDENT']/ext:id[@assigningAuthorityName='HPIO']/@root
submissionTime	current DateTime	In UTC format
uniqueId	Convert from UUID to OID	/cda:ClinicalDocument/cda:id/@root and then convert to 2.25.N where N is a decimal form of the UUID /cda:ClinicalDocument/cda:id/@extension add this to end of OID if exists oid^extension OID^extension

### D.2.1 Example of a FindDocuments Query Type

Finding the approved status of documents for a particular IHI number. The documents' metadata will be returned as extrinsic objects, as the ObjectResponse is specified as LeafClass.

```
<?xml version="1.0" encoding="utf 8"?>
<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap envelope" xmlns:a="http://www.w3.org/2005/08/addressing" xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0">
  <s:Header>
    <a:Action s:mustUnderstand="1">urn:ihe:iti:2007:RegistryStoredQuery</a:Action>
    <h:PCEHRHeader xml:id="user 878daa08 e20d 41b8 b355 ff43e8d31473">
      <User>
        <IDType>HPII</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>>false</useRoleForAudit>
      </User>
      <ihiNumber>8003601243017717</ihiNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>800362083337558</organisationID>
        <organisationName>The Local Practice</organisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature> ... </h:signature>
    <h:timestamp xml:id="time 60ecfdf2 cd6a 4685 9cb5 72fc627ff432">
      <created>2012 05 20T22:46:11.4992806+10:00</created>
    </h:timestamp>
    <a:MessageID>urn:uuid:2dc2ee30 98b5 4e3d a7b2 8cbf0645d31d</a:MessageID>
    <a:ReplyTo>
      <Address>http://www.w3.org/2005/08/addressing/anonymous</Address>
    </a:ReplyTo>
    <a:From>
      <Address>http://www.w3.org/2005/08/addressing/anonymous</Address>
    </a:From>
  </s:Header>
  <s:Body>
  </s:Body>
</s:Envelope>
```

```

</a:From>
<a:To s:mustUnderstand="1">http://www.w3.org/2005/08/addressing/anonymous</a:To>
</s:Header>
<s:Body xmlns:id="body b9f8ea9c be48 4d90 a627 f2ab6afa50b1">
  <AdhocQueryRequest xmlns="urn:oasis:names:tc:ebxml regrep:xsd:query:3.0">
    <ResponseOption returnType="LeafClass"/>
    <AdhocQuery id="urn:uuid:14d4deb7 8f97 4251 9a74 a90016b0af0d" xmlns="urn:oasis:names:tc:ebxml regrep:xsd:rim:3.0">
      <Slot name="$XSDDocumentEntryPatientId">
        <ValueList>
          <Value>'8003601243017717^^^&amp;1.2.36.1.2001.1003.0&amp;ISO'</Value>
        </ValueList>
      </Slot>
      <Slot name="$XSDDocumentEntryStatus">
        <ValueList>
          <Value>('urn:oasis:names:tc:ebxml regrep:StatusType:Approved')</Value>
        </ValueList>
      </Slot>
    </AdhocQuery>
  </AdhocQueryRequest>
</s:Body>
</s:Envelope>

```

### Example of FindDocuments response

Here, a set of extrinsic objects is returned for those documents belonging to the IHI number in the query that are accessible by the accessing organisation. See the XML sample on pages 38-43 for a typical extrinsic object. Also see Appendix D.1 for the structure XDS.b structure of the extrinsic objects returned by the system.

```

<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap envelope">
  <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
    <wsa:Action>urn:ihe:iti:2007:RegistryStoredQueryResponse</wsa:Action>
    <wsa:MessageID>2eb3577f 3e4d 4bfd b55b 7efe257bd45f</wsa:MessageID>
    <wsa:RelatesTo>urn:uuid:6a8bdfd0 7581 4a50 9e9f ecdf1acd9339</wsa:RelatesTo>
    .....
  </soap:Header>
  <S:Body xmlns:S="http://www.w3.org/2003/05/soap envelope">
    <query:AdhocQueryResponse xmlns:query="urn:oasis:names:tc:ebxml regrep:xsd:query:3.0" status="urn:oasis:names:tc:ebxml regrep:ResponseStatusType:Success">
      <rim:RegistryObjectList xmlns:rim="urn:oasis:names:tc:ebxml regrep:xsd:rim:3.0">
        <ns1:ExtrinsicObject xmlns:ns1="urn:oasis:names:tc:ebxml regrep:xsd:rim:3.0" id="urn:uuid:25ae0f42 0677 40a6 bc6c 58e51d28639a" isOpaque="false" lid="urn:uuid:25ae0f42 0677 40a6 bc6c 58e51d28639a" mimeType="application/zip" objectType="urn:uuid:7edca82f 054d 47f2 a032 9b2a5b5186c1" status="urn:oasis:names:tc:ebxml regrep:StatusType:Approved">
          .....
        </ns1:ExtrinsicObject>
        <ns1:ExtrinsicObject xmlns:ns1="urn:oasis:names:tc:ebxml regrep:xsd:rim:3.0" id="urn:uuid:5a70f11c df06 496b 98a7 2114e09ab31a" isOpaque="false" lid="urn:uuid:5a70f11c df06 496b 98a7 2114e09ab31a" mimeType="application/zip" objectType="urn:uuid:7edca82f 054d 47f2 a032 9b2a5b5186c1" status="urn:oasis:names:tc:ebxml regrep:StatusType:Approved">
          .....
        </ns1:ExtrinsicObject>
        <ns1:ExtrinsicObject xmlns:ns1="urn:oasis:names:tc:ebxml regrep:xsd:rim:3.0" id="urn:uuid:0c4be6f8 4e72 4d01 8f91 d0b6854aaf68" isOpaque="false" lid="urn:uuid:0c4be6f8 4e72 4d01 8f91 d0b6854aaf68" mimeType="application/zip" objectType="urn:uuid:7edca82f 054d 47f2 a032 9b2a5b5186c1" status="urn:oasis:names:tc:ebxml regrep:StatusType:Approved">
          .....
        </ns1:ExtrinsicObject>
        <ns1:ExtrinsicObject xmlns:ns1="urn:oasis:names:tc:ebxml regrep:xsd:rim:3.0" id="urn:uuid:0c4be6f8 4e72 4d01 8f91 d0b6854aaf68" isOpaque="false" lid="urn:uuid:0c4be6f8 4e72 4d01 8f91 d0b6854aaf68" mimeType="application/zip" objectType="urn:uuid:7edca82f 054d 47f2 a032 9b2a5b5186c1" status="urn:oasis:names:tc:ebxml regrep:StatusType:Approved">
          .....
        </ns1:ExtrinsicObject>
      </rim:RegistryObjectList>
    </query:AdhocQueryResponse>
  </S:Body>
</soap:Envelope>

```

## D.2.2 Example of a GetDocuments Query Type

The document is identified by the \$XDSDocumentEntryUniqueId.

```

<s:Envelope xmlns:s="http://www.w3.org/2003/05/soap-envelope">
  <s:Header>
    <Action xmlns="http://www.w3.org/2005/08/addressing" xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">urn:ihe:iti:2007:RegistryStoredQuery</Action>
    <h:PCEHRHeader xmlns:h="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns="http://ns.electronichealth.net.au/pcehr/xsd/common/CommonCoreElements/1.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:xsd="http://www.w3.org/2001/XMLSchema" xml:id="user-27e05478-ca98-483d-869f-7aeefe9a7a8a">
      <User>
        <IDType>HPII</IDType>
        <ID>8003619166674595</ID>
        <username>John Doe</username>
        <useRoleForAudit>false</useRoleForAudit>
      </User>
      <ihiNumber>8003601243017717</ihiNumber>
      <productType>
        <vendor>Oracle</vendor>
        <productName>dummyCISusr1</productName>
        <productVersion>dummyCISusrV1</productVersion>
        <platform>Windows XP</platform>
      </productType>
      <clientSystemType>CIS</clientSystemType>
      <accessingOrganisation>
        <organisationID>8003620833337558</organisationID>
        <organisationName>Local Practice</organisationName>
        <alternateOrganisationName>John Doe</alternateOrganisationName>
      </accessingOrganisation>
    </h:PCEHRHeader>
    <h:signature .....>
      .....
    </h:signature>
    .....
    <MessageID xmlns="http://www.w3.org/2005/08/addressing">urn:uuid:18bca8ae-836d-453a-a79f-c760a03107d8</MessageID>
    .....
  </s:Header>
  <s:Body xml:id="body-31d1a0eb-e6f6-4667-ac92-b3ca8ce03847">
    <AdhocQueryRequest xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:query:3.0">
      <ResponseOption returnType="LeafClass"/>
      <AdhocQuery xmlns="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0" id="urn:uuid:14d4deb-8f97-4251-9a74-a90016b0af0d">
        <Slot name="$XDSDocumentEntryPatientId">
          <ValueList>
            <Value>'8003601243017717^^^&1.2.36.1.2001.1003.0&ISO'</Value>
          </ValueList>
        </Slot>
        <Slot name="$XDSDocumentEntryStatus">
          <ValueList>
            <Value>('urn:oasis:names:tc:ebxml-regrep:StatusType:Approved')</Value>
          </ValueList>
        </Slot>
      </AdhocQuery>
    </AdhocQueryRequest>
  </s:Body>
</s:Envelope>

```

## Example of GetDocumentsReply

This is the response to the query quoted on pages 119. Here the extrinsic object is given in full.

```
<soap:Envelope xmlns:soap="http://www.w3.org/2003/05/soap-envelope">
  <soap:Header>
    <wsa:Action xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:ihe:iti:2007:RegistryStoredQueryResponse</wsa:Action>
    <wsa:MessageID xmlns:wsa="http://www.w3.org/2005/08/addressing">
      uuid:Id-0001340071471898-7ec645ea4fdfde2f0c69ff17-1
    </wsa:MessageID>
    <wsa:RelatesTo xmlns:wsa="http://www.w3.org/2005/08/addressing">urn:uuid:18bca8ae-836d-453a-a79f-c760a03107d8</wsa:RelatesTo>
    <soap:Header xmlns:wsa="http://www.w3.org/2005/08/addressing">
      <wsa:Action xmlns:a="http://www.w3.org/2003/05/soap-envelope" a:mustUnderstand="1">
urn:ihe:iti:2007:RegistryStoredQuery</wsa:Action>
      <wsa:MessageID>urn:uuid:227f1d98-a949-49ed-ab65-82b384d98516</wsa:MessageID>
      <wsa:RelatesTo>urn:uuid:18bca8ae-836d-453a-a79f-c760a03107d8</wsa:RelatesTo>
      <wsa:ReplyTo>
        <wsa:Address>http://www.w3.org/2005/08/addressing/anonymous</wsa:Address>
      </wsa:ReplyTo>
      <wsa:From>
        <wsa:Address>http://www.w3.org/2005/08/addressing/anonymous</wsa:Address>
      </wsa:From>
      <wsa:To xmlns:s="http://www.w3.org/2003/05/soap-envelope" s:mustUnderstand="1">http
s://144.140.140.218/getDocumentList</wsa:To>
    </soap:Header>
    <ns:signature .....>
      .....
    </ns:signature>
  </soap:Header>
  <soap:Body xmlns:S="http://schemas.xmlsoap.org/soap/envelope/" xml:id="Id-0001340071471
898-7ec645ea4fdfde2f0c69ff17-2">
    <ns8:AdhocQueryResponse xmlns:ns4="urn:hl7-org:v3" xmlns:ns3="http://common.pna.ws.pce
ehr.au/" xmlns:ns9="http://common.htb.ws.pcehr.au/" xmlns:ns5="http://ns.electronichealth
.net.au/Ci/Cda/Extensions/3.0" xmlns:ns6="urn:oasis:names:tc:ebxml-regrep:xsd:rim:3.0" xm
lns:ns10="http://view.htb.ws.pcehr.au/" xmlns:ns7="urn:oasis:names:tc:ebxml-regrep:xsd:rs
:3.0" xmlns:ns8="urn:oasis:names:tc:ebxml-regrep:xsd:query:3.0" status="urn:oasis:names:t
c:ebxml-regrep:ResponseStatusType:Success">
      <ns6:RegistryObjectList>
        <ns6:ExtrinsicObject isOpaque="false" mimeType="application/zip" status="urn:osi
s:names:tc:ebxml-regrep:StatusType:Approved" objectType="urn:uuid:7edca82f-054d-47f2-a032
-9b2a5b5186c1" lid="urn:uuid:e6c40098-367f-42d6-b2bd-aff3b3a17c1a" id="urn:uuid:e6c40098-
367f-42d6-b2bd-aff3b3a17c1a">
          .....
        </ns6:ExtrinsicObject>
      </ns6:RegistryObjectList>
    </ns8:AdhocQueryResponse>
  </soap:Body>
</soap:Envelope>
```



# Appendix E Web Service Errors

<b>errorCode</b>	<b>codeContext</b>	<b>Explanation</b>
badWsaMessageId	PCEHR_ERROR_0001 – Message ID element is missing	Missing Message Id
badlyFormedMsg	PCEHR_ERROR_0002 – SOAP header fault	Incorrect SOAP Header
badlyFormedMsg	PCEHR_ERROR_0003 – SOAP body fault	Incorrect SOAP Body
notAuthorised	PCEHR_ERROR_0004 – Authorisation denied	Denied Access
serviceTemporaryUn available	PCEHR_ERROR_0005 – Back end system temporary unavailable	Service Unavailable
badParam	PCEHR_ERROR_0006 – Invalid common parameter	A parameter is not in a valid format
badParam	PCEHR_ERROR_0007 – Invalid IHI	IHI is not in the valid format
badParam	PCEHR_ERROR_0008 – Invalid HPI-I	HPI-I is not in the valid format
badParam	PCEHR_ERROR_0009 – Invalid HPI-O	HPI-O is not in the valid format
badlyFormedMsg	PCEHR_ERROR_0010 – The request did not contain the expected message format	Incorrect SOAP Request
serviceTemporaryUn available	PCEHR_ERROR_0011 – Unexpected service exception error	PCEHR System Error
serviceTemporaryUn available	PCEHR_ERROR_0012 – Unexpected back end exception error	PCEHR System Error
serviceTemporaryUn available	PCEHR_ERROR_0013 – Invalid back end response	PCEHR System Error
serviceTemporaryUn available	PCEHR_ERROR_0014 – Unknown back end error code	PCEHR System Error
badParam	PCEHR_ERROR_0503 – User name for audit element is missing	Incorrect PCEHR Header
badParam	PCEHR_ERROR_0504 – User role for audit element is missing	Incorrect PCEHR Header
serviceTemporaryUn available	PCEHR_ERROR_0507 – Unexpected service exception error	PCEHR System Error
badParam	PCEHR_ERROR_0511 – ClientSystemType is missing	Incorrect PCEHR Header
badWsaAction	PCEHR_ERROR_0513 – Invalid WS-addressing action	Invalid WS-Addressing
badWsaTo	PCEHR_ERROR_0514 – WS-addressing “to” field is missing	Invalid WS-Addressing
notAuthorised	PCEHR_ERROR_0519 – System authorisation denied	Access Denied
badSignature	PCEHR_ERROR_0520 – The SOAP request has not been signed, or is signed incorrectly	Invalid ATS5821 Signature
badAlgorithmC14N	PCEHR_ERROR_0521 – The algorithm used for canonicalizing the data is not acceptable	Invalid ATS5821 Signature
badAlgorithmDigest	PCEHR_ERROR_0522 – The algorithm used for calculating the digest is not acceptable	Invalid ATS5821 Signature
badAlgorithmSignatu re	PCEHR_ERROR_0523 – The algorithm used for signing is not acceptable	Invalid ATS5821 Signature

# Appendix F System Business Scenarios

The table below provides a summary of the PCEHR related use cases. For the detailed description of the applicable use cases see Clinical Information Systems Connecting to the PCEHR System: Use Cases [CIS UC].

Business Scenario	Description	Use Case Reference
Verify that a PCEHR Exists	To verify whether a given PCEHR exists.	3.1 UC.CIS.001 – Check if an advertised PCEHR exists
Gain Access to a PCEHR For the First Time	<p>To gain access to an individual's PCEHR for the first time. Depending on how an individual has set their access control settings, the node of gaining access is:</p> <ul style="list-style-type: none"> <li>• <b>Open Access</b> – A healthcare provider has unrestricted access to an individual's PCEHR and, as a result, the provider is granted "General Access."</li> <li>• <b>RAC Access</b> (formerly called PACC Access) – a healthcare provider must provide an RAC (Restricted Access Code) granted by an individual. The access level granted here is "General Access".</li> <li>• <b>LDAC Access</b> (formerly called PACCX Access) – a healthcare provider is able to access an individual's PCEHR when granted a LDAC (Limited Document Access Code) by the individual. The access level granted here is "Limited Access".</li> </ul>	3.2 UC.CIS.002 – Gain Access to PCEHR
Gain Access to a PCEHR Using "Emergency Access"	Regardless of how an individual has set their access control settings, "Emergency Access" bypasses all control settings. A healthcare provider is able to access an individual's PCEHR by asserting "Emergency Access" and the access level granted here is "Limited Access."	12.4 UC.CIS.002 – Gain Access to PCEHR
Subsequent Access to a PCEHR	Once access to an individual's PCEHR was established, that access persists until it expires or until the individual decides to revoke that access.	12.4 UC.CIS.002 – Gain Access to PCEHR
Re-Authorise Access to a PCEHR	Once an individual's PCEHR has been opened, the provider's access level can still be altered through the provision by the individual of a different code. This upgrades the original access level from "General Access" to "Limited Access" if the new code is of type LDAC; or downgrades the level from "Limited Access" to "General Access" if the new one is a RAC.	12.4 UC.CIS.002 – Gain Access to PCEHR
Retrieve a Clinical Document	<p>A clinical document is retrieved from the PCEHR System for a given individual's PCEHR.</p> <p>A healthcare provider is only able to access a document with access level that is consistent with the provider's except if the provider is the author of the document. Situations can be:</p> <p>If the provider is not the authoring organisation for the document, the document the provider can access will depend on the access level that provider has. If the provider's access level is "General Access", the document they are able to access has to be "General Access"; if the provider has "Limited Access", then the provider can access documents marked as "General Access" or "limited Access".</p> <p>If the provider is the authoring organisation for the document, that document is always accessible to the provider regardless which access level the document has.</p>	4.4 UC.CIS.204 – Download a Clinical Document

Business Scenario	Description	Use Case Reference
Search for a Clinical Document	<p>A search is conducted for a document based on certain search criteria set in the PCEHR System.</p> <p>The criteria should be based on the parameters available in the index view.</p>	4.4 UC.CIS.204 – Download a Clinical Document
Upload a Clinical Document	<p>A Clinical Document is uploaded to an individual’s PCEHR. The document types scoped are: Shared Health Summary; Event Summary; and Discharge Summary. Uploading a document is initiated within the local system, meaning the activity can be performed by a healthcare provider regardless of their access level to the individual’s PCEHR, or whether their access has been revoked. A clinical document for uploading can be a new document or an amended existing one. However, different business rules apply depending on the type of the document, whether new or amended. Typical scenarios are:</p> <ul style="list-style-type: none"> <li>• A new document is not allowed to be uploaded to a PCEHR that is deactivated but amendment is permitted;</li> <li>• An amendment can be uploaded to a document that has been removed. This is to ensure the completeness of the document set.</li> </ul> <p>Upon receiving a document, the PCEHR System will set the new document’s access level to the default. The default access level – either “General Access” or “Limited Access” – depends on the which of the following circumstances applies:</p> <ul style="list-style-type: none"> <li>• If the healthcare provider has never before accessed the individual’s PCEHR, the default access level will be “General Access”.</li> <li>• If the healthcare provider has accessed the individual’s PCEHR before – that is, the provider is on the individual’s “Provider Access List” – and depending on how the individual set the default and write access level for that provider, the PCEHR System <b>SHALL</b> use those access levels for that document.</li> <li>• If the healthcare provider’s access has been revoked, the default access level of an upload by the provider will be “General Access”.</li> </ul> <p>The exception is the Shared Health Summary whose access level is always “General Access.”</p> <p>If the uploaded document is an amendment, the access level of this document will inherit its predecessor’s.</p>	<p>4.1 UC.CIS.201 – Upload a Clinical Document</p> <p>4.2 UC.CIS.202 – Supersede a clinical document</p>

Business Scenario	Description	Use Case Reference
Remove a Clinical Document	<p>A clinical document is removed for various reasons. A reason for removal must be provided when requesting a document removal. The options available for the reasons for removal in the PCEHR System are:</p> <ul style="list-style-type: none"> <li>• Incorrect Identity</li> <li>• Elect to remove</li> <li>• Withdrawn</li> </ul> <p>Only the provider that has authored the document (as well as the individual owner of the PCEHR) can remove it.</p> <p>The individual who is initiating the removal request must be in the same healthcare provider organisation as the healthcare provider who has authored or superseded the clinical document.</p> <p>A removed document can still be viewed by its authoring healthcare provider organisation but not by other provider organisations.</p> <p>To reinstate a document once it has been removed, the authoring organisation must contact the PCEER System Operator or supersede the document with a new version of the document.</p>	4.3 UC.CIS.203 – Remove a Clinical Document
Index View	<p>This case is where all the documents that a provider is authorised to access for a given PCEHR are retrieved and presented in an index view listing.</p> <p>The content of the index view is:</p> <ul style="list-style-type: none"> <li>• Event Date (i.e.: date of the actual event)</li> <li>• Date and time that the document was created and signed</li> <li>• Document type (e.g.: Discharge Summary, Event Summary, etc.)</li> <li>• Organisation role (e.g.: General Practice, Hospital, etc.)</li> <li>• Healthcare role of authoring individual (e.g. Endocrinologist)</li> <li>• Name of the authoring organisation</li> <li>• Name of the authoring individual</li> </ul>	4.4 UC.CIS.204 – Download a Clinical Document

# Appendix G Acronyms and Terminology

## G.1 Acronyms

<b>Acronym</b>	<b>Explanation</b>
API	Application Program Interface
CDA	Clinical Document Architecture
CIS	Clinical Information System
CSP	Contracted Service Providers
DoHA	Department of Health and Ageing, the Australian Government.
DVA	Department of Veteran Affairs, the Australian Government
IHE	Integrating the Healthcare Enterprise
ITI	IT Infrastructure – part of the IHE initiative
JeHDI	Joint eHealth Data and Information (an eHealth initiative by the Australian Defence Force)
LDAC	Limited Document Access Code
LSS	Logical Service Specification, a type of PCEHR specification released by Nehta.
MTOM	Message Transmission Optimisation Mechanism
NEHTA	National eHealth Transition Authority
OID	Object Identifier
PACC	An obsolete term. Now called RAC (Record Access Code)
PACCX	An obsolete term. Now called LDAC (Limited Document Access Code)
PCEHR	Personally Controlled Electronic Health Record
RAC	Record Access Code
TLS	Transport Layer Security
TSS	Technical Service Specification, a type of PCEHR specification released by Nehta.
WSDL	Web Service Definition Language
XDS.b	Cross-Enterprise Document Sharing-b
XML	Extensible Markup Language

## G.2 Specialised Terminology

Term	Explanation
B2B	Business to Business. The name of the webservice used for transactions between distributed components of the PCEHR System
Clinical information systems	Information systems used in-house by hospitals and healthcare practices for the provision of patient care .
Registered repositories	Third party certified data repositories that store and provide PCEHR data.
Invoker role	A B2B invoker sends queries and receives responses.
Message	A message represents the data structure passed from its sender to its recipients. The structure of a message is defined in a service description. <a href="http://www.w3.org/TR/ws-arch/#message">http://www.w3.org/TR/ws-arch/#message</a>
MIME encoding	Multipurpose Internet Mail Encodings. Now no longer confined to mail messages. Re-encodes 8-bit binary streams into 7-bit ASCII for transmission.
Provider role	A B2B provider sends responses to queries by other providers, as well as sending queries to the PCEHR System. Currently the provider role is not supported by the PCEHR System.
Request	A SOAP message that provides inputs to the PCEHR System. The message is identified by a unique Id.
Response	A SOAP message that provides outputs to a particular request. The message has its own Id and is also associated with the Id of the original request.
SOAP	An XML-based messaging protocol where, in the PCEHR context, a message consists of a SOAP envelope containing a SOAP header and a SOAP main body.
Web Service	Web services provide a standard means of interoperating between different software applications, running on a variety of platforms and/or frameworks. This document defines the architecture: <a href="http://www.w3.org/TR/ws-arch/">http://www.w3.org/TR/ws-arch/</a>

# Appendix H References

Tag	Name	Version Release Date
ATS 5820-2010	eHealth web services profiles <a href="http://infostore.saiglobal.com/store/details.aspx?ProductID=1391033">http://infostore.saiglobal.com/store/details.aspx?ProductID=1391033</a>	5 March 2010
ATS 5821-2010	E-health XML secured payload profiles <a href="http://infostore.saiglobal.com/store/details.aspx?ProductID=1391034">http://infostore.saiglobal.com/store/details.aspx?ProductID=1391034</a>	5 March 2010
ConOps	PCEHR Concept of Operations and Addendum(s): Relating to the introduction of a Personally Controlled Electronic Health Record System <a href="http://www.yourhealth.gov.au/internet/yourhealth/publishing.nsf/Content/pcehr-document#.Uzc7prX-Euc">http://www.yourhealth.gov.au/internet/yourhealth/publishing.nsf/Content/pcehr-document#.Uzc7prX-Euc</a>	
IHE	IHE Australia ( <a href="http://www.ihe.net.au/">http://www.ihe.net.au/</a> ) Links to all Australian and International IHE standards.	
MTOM	SOAP Message Transmission Optimization Mechanism W3C Recommendation <a href="http://www.w3.org/TR/soap12-mtom/">http://www.w3.org/TR/soap12-mtom/</a>	25 January 2005
SOAP 1.2	SOAP 1.2 Standards <a href="http://www.w3.org/TR/soap/">http://www.w3.org/TR/soap/</a>	2 <sup>nd</sup> Edition 27 April 2007

The following documents are available from <https://vendors.nehta.gov.au>

Tag	Name	Version Release Date
CDA DS IG	eDischarge Summary – CDA Implementation Guide	Version 3.4 7 Mar 2012
CDA PKG	CDA Package (under “PCEHR Core System”, “Clinical Documents”, “Common Specifications”)	Version 1.0 30 November 2011
CDA RNDR	CDA Rendering Specification (found under Clinical Documents, Common Specifications)	Version 1.0 7 March 2012
CDA SHS IG	PCEHR Shared Health Summary CDA Implementation Guide (under Clinical Documents, “Shared Health Summary”)	Version 1.3 7 Mar 2012
COLLAB TST GRP	eHealth Collaborate Industry CCA Test Group <a href="https://industry.ehealthcollaborate.com.au/group/test-interest-group-shared">https://industry.ehealthcollaborate.com.au/group/test-interest-group-shared</a> (Request access through NEHTA Help Centre <a href="http://www.nehta.gov.au/help-centre">http://www.nehta.gov.au/help-centre</a> )	
CIS UC	Clinical Information Systems Connecting to the PCEHR System: Use Cases (Under CCA, PCEHR) <a href="https://vendors.nehta.gov.au">https://vendors.nehta.gov.au</a>	Version 1.1 6 September 2012
DEX LSS	PCEHR Document Exchange Service <a href="https://vendors.nehta.gov.au/Logical%20Service%20Specification">https://vendors.nehta.gov.au/Logical Service Specification</a>	Version 1.2 6 September 2012

<b>Tag</b>	<b>Name</b>	<b>Version Release Date</b>
DEX TSS	PCEHR Document Exchange Service Specification Using the IHE XDS.b Platform	Version 1.4 Version 1.4 12 April 2013
PA FUNC	PCEHR Participation and Authorisation Functional Overview	Version 1.0 9 December 2011
RA LSS	PCEHR Record Access Service Logical Service Specification	Version 1.0 9 December 2011
RA TSS	PCEHR Record Access Technical Service Specification	Version 1.4 6 September 2012
Registration LSS	PCEHR Registration Service Logical Service Specification	Version 1.1 19 November 2012
Registration TSS	PCEHR Registration Service Technical Service Specification	Version 1.1 19 November 2012
Schemas TSS	PCEHR_Schemas (under PCEHR Core System - PCEHR B2B Gateway)	PCEHR_Schemas- 20130208-B2B
Template LSS	Template Service Interface Logical Service Specification	Version 1.0 9 December 2011
Template PKG	Technical Specification Template Package (Under PCEHR Core System, Template Service, Template Packaging Specifications)	Version 1.0 28 May 2012
Template TSS	Template Service Interface Technical Service Specification	Version 1.2 26 April 2012
VIEW LSS	PCEHR View Service Logical Service Specification	Version 1.3 5 April 2013
VIEW TSS	PCEHR View Service Technical Service Specification	Version 1.5 5 April 2013