

Hold Data Model and Services 3.1

# Document Status

status: Request for Comment (valid values are < Request for Comment, Preliminary Review, Public Review, Architectural Review, Final Review, Published, Deprecated)

This version: **Assembla**.com. Files Tag = CUFX\_3.1\_RFC\_Active

Previous Version: **Assembla**.com. Files Tag = CUFX\_3.0\_RFC\_Archive

# Change Log

|  |  |  |
| --- | --- | --- |
| Version | Date | Changes |
| 3.0 | **04/02/2014** | * Initial Document |
| 3.0 | **05/07/2014** | * Updated examples to include Read by Hold Id and Account Id, removed Hold Id field from create hold example. |
| 3.1 | **07/17/2015** | * Updated to release 3.1 |

# Overview of Specification

The CUFX Hold Data Model and Service provides a standard description for Hold payment definitions and instances of those payments. The CUFX Hold Data Model and Services provide the information necessary to create, read, update or delete Hold transactions between credit union data systems.

# Any know Errors in the document

|  |  |
| --- | --- |
| **Error Description** | Status of Error |
|  |  |

Table of Contents

[Document Status 1](#_Toc387240495)

[Change Log 1](#_Toc387240496)

[Overview of Specification 1](#_Toc387240497)

[Any know Errors in the document 1](#_Toc387240498)

[Document Conventions 2](#_Toc387240499)

[Definitions related to the specification 2](#_Toc387240500)

[Data Elements 3](#_Toc387240501)

[Filters used when accessing the HOLD data 3](#_Toc387240502)

[Hold Data attributes 3](#_Toc387240503)

[Use Case 4](#_Toc387240504)

[Services 4](#_Toc387240505)

[Authentication 4](#_Toc387240506)

[Hold Resource Based Create, Read, Update, Delete 5](#_Toc387240507)

[REST-JSON Create Hold 5](#_Toc387240508)

[REST-JSON Read Hold By Hold Id 6](#_Toc387240509)

[REST-JSON Read Hold By Account Id 7](#_Toc387240510)

[REST-JSON update Hold 8](#_Toc387240511)

[REST-JSON Delete pending Hold 9](#_Toc387240512)

[General Error handling For All Services 10](#_Toc387240513)

[Bibliography 10](#_Toc387240514)

# Document Conventions

List any document conventions such as what bold and italics mean and how the document is intended to be read.

“Within this specification, the key words “MUST”, “MUST NOT”, “REQUIRED”, “SHALL”, “SHALL NOT”, “SHOULD”, “SHOULD NOT”, “RECOMMENDED”, “MAY”, and “OPTIONAL” are to be interpreted as described in W3 Working Group (W3C)]. However, for readability, these words do not appear in all uppercase letters in this specification.

At times, this specification recommends good practice for authors and user agents. These recommendations are not normative and conformance with this specification does not depend on their realization. These recommendations contain the expression “We recommend …”, “This specification recommends …”, or some similar wording.”

All formatting in this document utilize Word Styles.

All Citations must utilize Word Citations to automatically show at the end of the document.

All updates after the initial creation must be performed using Tracking Changes turn on and Accepted by the Architecture committee.

# Definitions related to the specification

Account Data

The CUFX account Data model and Services defines the account data model and Services used by all specifications. Accounts are an abstract summary of loan, share and investment balances at a high level. Any financial product stored in a financial services platform optionally including any transactions associated with that account.

# Data Elements

## Filters used when accessing the HOLD data

Refer to Security Services documentation to understand what may be contained the header and processed by security procedures. When accessing the data include **MessageContext.xsd** so that the service can determine the scope of the request. Refer to recent CUFX messageContext Data and CUFX Security Services for use of MessageContext.xsd. Include any filter variables related to the request. See **HoldFilter.xsd.**

## Hold Data attributes

All CUFX fields related to a hold are defined in hold.xsd. A summary of the attributes is listed here for reference.

Note: Fields not listed in the calling specification are generally not to be returned to the calling specification. i.e. If the field holdType is not listed in the calling specification, then do not return the data field to alleviate issues with unexpected information and bloat of information being returned to light weight applications.

|  |  |
| --- | --- |
| **Attribute** | **Description** |
| holdId | The hold ID is a persistent and unique identifier for the hold. |
| accountId | ID of account related to the hold. |
| transactionId | The transaction ID is a persistent and unique identifier for the transaction related to the hold. |
| holdType | The hold type is the textual representation of the kind of stop/hold. |
| effectiveDate | Date/time that the hold was created or should take effect. |
| expirationDate | Date/time that the hold should be released. |
| actualReleaseDate | Date/time that the hold was actually released. |
| holdStatus | The status of the hold |
| description | Description of the hold and/or a note attached to the hold. |
| amount | Amount of the hold. |
| payee | For stop payment holds, name of the draft or ACH payee. |
| reason | Reason for the stop/hold. |
| feeId | This is the definition of a fee that could be associated with a hold. |

# Use Case

CUFX Compliant Application

1

Create Hold Message

2

Hold Data Response

Contains holdStatus or error

3

Read Hold Message

4

Hold Data Message Response

Contains holdStatus or error

CUFX Core Data Provider

5

Update Hold Message

6

Hold Data Message Response

Contains holdStatus Code or error

,

7

Delete Hold Message

8

Hold Data Response

Contains actualReleaseDate, holdStatus or error

# Services

|  |  |
| --- | --- |
| Definition | HoldTransfer Service |
| Overview of Capabilities | Service to create, read, update and delete Hold-Transfer |
| Dependencies | Security Services, messageContext |
| CUFX REST LINK | https://api.dataprovider.com/HoldTransfer |
| CUFX WSDL LINK |  |

## Authentication

See Security Services and messageContext for more detail.

## Hold Resource Based Create, Read, Update, Delete

|  |  |
| --- | --- |
| INPUTS | cufx: HoldMessage (which includes)   * [cufx:MessageContext](file:///\\files2\users\CMarjaniemi\Projects\CUFX\MessageContext.html) * cufx:HoldFilter (for read, update, delete) * cufx:HoldList (for create, update) |
| Outputs | cufx:Transfer (for create, read, update and delete) |
| Return Values | Cufx: Error |
| Side Effects | Creation, read, update or deletion of single Hold-transfer. |
| Dependencies | Security Services for authentication and security. |
| Fields used | **Message Headers** : See security services  **messageContext**: See messageContext.xsd  **Filters**: See DepositFilter.xsd  **Attributes: Transfer : See Holds.xsd** |
| Testing Procedures for Certification |  |

### REST-JSON Create Hold

REQUEST:

**<Security related header parameters... see Security Services>**

Accept: application/json

Accept-Charset: utf-8

Accept-Language: en-us

Content-type: application/json; charset=utf-8

X-API-Version: >=3.0.0

POST https://api.dataprovider.com/hold

{

"holdMessage": {

"messageContext": {

},

"holdList": {

"hold": [

{

"accountId": "accountId1",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"description": "description1",

"amount": {

"value": "231.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

}

RESPONSE

Headers:

Status Code: 200 Ok

Content-type: application/json; charset=utf-8

Content-Language: en-us

Payload:

{

"holdList": {

"hold": [

{

"holdId": "holdId1",

"accountId": "accountId1",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"holdStatus": "Active",

"description": "description1",

"amount": {

"value": "231.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

### REST-JSON Read Hold By Hold Id

REQUEST:

**<Security related header parameters... see Security Services>**

Accept: application/json

Accept-Charset: utf-8

Accept-Language: en-us

Content-type: application/json; charset=utf-8

X-HTTP-Method-Override:GET

X-API-Version: >=3.0.0

**POST** https://api.dataprovider.com/hold

{

HoldMessage: {

“messageContext”: { <see messageContext.xsd>

},

"holdFilter": {

"holdIdList": {

"holdId": [

"43732"

]

}

}

}

}

RESPONSE

Headers:

Status Code: 200 Ok

Content-type: application/json; charset=utf-8

Content-Language: en-us

Payload:

{

"holdList": {

"hold": [

{

"holdId": "43732",

"accountId": "223393",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"holdStatus": "Active",

"description": "description1",

"amount": {

"value": "231.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

### REST-JSON Read Hold By Account Id

REQUEST:

**<Security related header parameters... see Security Services>**

Accept: application/json

Accept-Charset: utf-8

Accept-Language: en-us

Content-type: application/json; charset=utf-8

X-HTTP-Method-Override:GET

X-API-Version: >=3.0.0

**POST** https://api.dataprovider.com/hold

{

HoldMessage: {

“messageContext”: { <see messageContext.xsd>

},

"holdFilter": {

"accountIdList": {

"accountId": [

"223393"

]

},

}

}

}

RESPONSE

Headers:

Status Code: 200 Ok

Content-type: application/json; charset=utf-8

Content-Language: en-us

Payload:

{

"holdList": {

"hold": [

{

"holdId": "43732",

"accountId": "223393",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"holdStatus": "Active",

"description": "description1",

"amount": {

"value": "231.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

### REST-JSON update Hold

REQUEST:

**<Security related header parameters... see Security Services>**

Accept: application/json

Accept-Charset: utf-8

Accept-Language: en-us

Content-type: application/json; charset=utf-8

X-API-Version: >=3.0.0

**PUT** https://api.dataprovider.com/hold

{

HoldMessage: {

“messageContext”: { <see messageContext.xsd>

},

"holdFilter": {

"holdIdList": {

"holdId": [

"43732"

]

},

"accountIdList": {

"accountId": [

"223393"

]

},

},

"holdList": {

"hold": [

{

"holdId": "43732",

"accountId": "223393",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"holdStatus": "Active",

"description": "description1",

"amount": {

"value": "124.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

}

RESPONSE

Headers:

Status Code: 200 Ok

Content-type: application/json; charset=utf-8

Content-Language: en-us

Payload:

{

"holdList": {

"hold": [

{

"holdId": "43732",

"accountId": "223393",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"holdStatus": "Active",

"description": "description1",

"amount": {

"value": "124.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

### REST-JSON Delete pending Hold

REQUEST:

**<Security related header parameters... see Security Services>**

Accept: application/json

Accept-Charset: utf-8

Accept-Language: en-us

Content-type: application/json; charset=utf-8

X-HTTP-Method-Override: DELETE

X-API-Version: >=3.0.0

**PUT** https://api.dataprovider.com/hold

{

HoldMessage: {

“messageContext”: { <see messageContext.xsd>

},

"holdFilter": {

"holdIdList": {

"holdId": [

"43732"

]

},

"accountIdList": {

"accountId": [

"223393"

]

},

}

}

}

RESPONSE

Headers:

Status Code: 200 Ok

Content-type: application/json; charset=utf-8

Content-Language: en-us

Payload:

{

"holdList": {

"hold": [

{

"holdId": "43732",

"accountId": "223393",

"transactionId": "transactionId1",

"holdType": "GeneralPurpose",

"effectiveDate": "1900-01-01T01:01:01Z",

"expirationDate": "1900-01-01T01:01:01Z",

"actualReleaseDate": "1900-01-01T01:01:01Z",

"holdStatus": "InActive",

"description": "description1",

"amount": {

"value": "124.00",

"currencyCode": "USD"

},

"payee": "payee1",

"reason": "Unknown",

"feeId": "feeId1"

}

]

}

}

# General Error handling For All Services

Refer to latest CUFX documentation *Error Mapping*.

# Bibliography

W3C. (n.d.). *Key words for use in RFCs to Indicate Requirement Levels [RFC2119].* Retrieved Sept. 8th, 2011, from W3C.