

RETS Change Proposal 76

GetPayloadList

Information

Originating Workgroup: Transport Workgroup

Contact Information

Author: Steve Clarke

Organization: Marketlinx Inc.

Phone: (505) 286-4800

Address: 1400 Centerpoint Blvd Ste 100,
Knoxville, TN, 37932

Email: sclarke@marketlinx.com

Status: Accepted

Submitted Date: February 26, 2009

Voting Date: April 7th, 2009

RETS Version: 1.7.2

Synopsis

The objective is to define a discovery mechanism for predefined XML payload documents that can optionally be accessed via RETS 1.x queries. This proposal defines a new transaction that advertises the available payloads on a RETS 1.x server and describes how these payloads would be accessed from a RETS 1.x query request.

Rationale

There has been a longstanding desire to be able to access standardized search results (payloads) via a RETS 1.x query request. Most urgently, the RESO community is looking for a way to provide a transport mechanism to support the Syndication XSD. This RCP satisfies that need.

Proposal

3.1 Login Response

Add new *GetPayloadList* transaction definition to login response.

Example:

```
<RETS ReplyCode="0" ReplyText="Success.">
  <RETS-RESPONSE>
    Info=MEMBERNAME;Character;MarketLinx Sys Config
    Info=USERID;Character;866424041
    Info=USERLEVEL;Int;90
    Info=USERCLASS;Character;!P
    Info=AGENTCODE;Character;sys_config
    Info=BROKERCODE;Character;GEAC
    Info=BROKERBRANCH;Character;GEAC01
    Info-METADATAID;Character;303_65_47_BRC
    Info=METADATAVERSION;Character;17.73.76591
    Info=METADATATIMESTAMP;DateTime;Tue, 12 Feb 2008 23:16:31 GMT
    Info=MINMETADATATIMESTAMP;DateTime;Tue, 12 Feb 2008 23:16:31 GMT
    Info=BOARD;Character;X
    Info=BROKERRECIPFLAG;Boolean;Y
    Info=MAINOFF;Character;GEAC
    Info=OFFICE;Character;GEAC01
    Info=SUL;Int;90
    Info=UC;Character;!P
    Info=USER;Character;sys_config
    ChangePassword=/ChangePassword.aspx/ChangePassword
    GetObject=/GetObject.aspx/GetObject
    Login=/Login.aspx/Login
    Logout=/Logout.aspx/Logout
    Search=/Search.aspx/Search
    GetMetadata=/GetMetadata.aspx/GetMetadata
    Update=/Update.aspx/Update
    PostObject=/PostObject.aspx/PostObject
    GetPayloadList=/GetPayloadList.aspx/GetPayloadList
  </RETS-RESPONSE>
</RETS>
```

3.2 *GetPayloadList* Transaction

The GetPayloadList transaction is used to retrieve a list of available payloads supported on the RETS Server. Payloads are defined as a subset of the “RESO schema” vocabulary.

Required Client Request Header Fields

There are no additional required client header fields.

Required Request Arguments

None.

Optional Request Arguments

ID

The ID argument in the GetMetadata transaction reflects the metadata hierarchy as shown in Figure 11.1. For any metadata element, the ID argument is a list of the names of the parent elements for the desired element, separated by colons. For example, to retrieve the payload list for a given named Resource, the argument is simply the ResourceID.

[/GetPayloadList?ID=Property](#)

To retrieve the payload list for a specific class within a resource:

[/GetPayloadList?ID=Property:RES](#)

Format

The format option does not apply to the *GetPayloadList* request because the response is always considered to be in COMPACT format. See below.

Required Server Response Header Fields

None.

Required Response Arguments

There are no required response arguments.

Optional Response Arguments

There are no optional response arguments.

GetPayloadList Response Body Format

Example COMPACT reply:

```
<RETSPayloadList Resource="Property" Class="2" Version="1.00.000" Date="2009-02-11T12:17:12-05:00" >
<COLUMNS>→PayloadName→Resource→Class→Description→URI→MetadataEntryID</COLUMNS>
<DATA>→RESO Syndication→Property→1→RESO Standard Syndication
Payload→http://rets.org/xsd/Syndication.xsd→1x123</DATA>
<DATA>→RESO Syndication→Property→2→RESO Standard Syndication
Payload→http://rets.org/xsd/Syndication.xsd→2x123</DATA>
<DATA>→RESO Syndication→Property→3→RESO Standard Syndication
Payload→http://rets.org/xsd/Syndication.xsd→3x123</DATA>
</RETSPayloadList>
```

Note: If there are multiple versions of a payload, the URI for the payload be the **Namespace URI** for the version of the schema that is supported. For example, one of the syndication versions is <http://rets.org/xsd/Syndication/2008-03>.

Reply Codes

RETS 1.7 requires all server responses to be well-formed XML, and additionally requires *GetPayloadList* responses to be valid XML. In addition, RETS requires that clients parse server responses as XML, not as simple text streams. The response formats shown here are normative with respect to content, but not normative with respect to form. That is, servers are free to produce response XML in any format that complies with the W3C XML 1.0 recommendation, so long as it is valid with respect to the appropriate DTD. XML escaping of content is implied, as is XML processing of white space and line endings. See the W3C *XML Recommendation 1.0, Third Edition*, for full information on XML.

Table X-X *GetPayloadList* Reply Codes (Sheet 1 of 2)

Reply Code Meaning

- 0 – Operation successful.
- 20500 Invalid Resource The request could not be understood due to an unknown resource.
- 20503 No Metadata Found No matching metadata of the type requested was found.
- 20511 Timeout The request timed out while executing.
- 20513 Miscellaneous error The server encountered an internal error.

3.3 Search Transaction

```
/Search?SearchType=Property&Class=2&Query=(ListPrice=300000-)  
&QueryType=DMQL2&Count=0&Payload=RESO Syndication
```

Note, a search request that specifies a **&Payload** **MUST not** include the **&Select** and **&Format** arguments. The payload itself defines the desired data elements and the format of the response.

Additional Reply Codes:

(ReplyCodes tbd because these should be maintained centrally by document manager)

- Payloads not supported at all.
- Invalid Payload for this Resource/Class
- Cannot combine &Select with &Payload.
- Cannot combine &Format with &Payload.

Impact

Compatible with 1.7.2 and above. This is a new transaction which is self-contained. A server can simply leave this out of their capabilities URL list in the Login response. If no Payloads are advertised, then none need to be supported in the search request/response.

Compatibility

Document History

Date	Version	Author	Description
December 1, 2008	1.0	Steve Clarke	Initial Release
February 26,2009	1.1	Steve Clarke	Revisions from review