
SPARCL

Release 0.0a1

S.Pothier

May 11, 2021

CONTENTS:

1	api	1
1.1	api package	1
2	Indices and tables	3
	Python Module Index	5
	Index	7

1.1 api package

1.1.1 Subpackages

1.1.2 Submodules

1.1.3 api.client module

Client module for SPARCL.

This module interfaces to the SPARC-Server to get spectra data.

Todo:

- Add conversion from Server pickle (json) to Pandas.
-

```
class api.client.SparclApi (url='http://sparcl.datalab.noirlab.edu:8000',          verbose=False,
                             limit=None)
```

Bases: object

Provides interface to SPARCL Server.

Object creation compares the version from the Server against the one expected by the Client. Throws error if the Client is a major version or more behind.

KNOWN_GOOD_API_VERSION = 1.0

retrieve (objid_list: list, columns=None, format=None, xfer=None, limit=False, verbose=False) → list
Get spectrum from spectObjId list.

Parameters

- **columns** (list, optional) – List of column names. Defaults to ['flux', 'loglam'].
One of: flux, loglam, ivar, and_mask, or_mask, wdisp, sky, model
- **format** (str) – TODO. Format of the data structure that contains spectra
- **xfer** (str) – DEBUGGING. Format to use to transfer from Server to Client
- **limit** (int, optional) – Maximum number of spectra records to return.

Returns JSON structures (format=None).

Return type list

sample_sids()

Return a small list of spect ids.

This is intended to make it easy to get just a few spect ids to use for experimenting with the rest of the API.

property version

Return version of Server Rest API used by this client.

If the Rest API changes such that the Major version increases, a new version of this module will likely need to be used.

Returns API version

Return type float

Examples

```
>>> SparclApi('http://localhost:8030').version
1.0
```

1.1.4 api.utils module

`api.utils.here_now()`

`api.utils.objform(obj)`

Nested structure of python object. Avoid spewing big lists. See also: <https://code.activestate.com/recipes/577504/>

`api.utils.tic()`

`api.utils.toc()`

1.1.5 Module contents

INDICES AND TABLES

- `genindex`
- `modindex`
- `search`

PYTHON MODULE INDEX

a

api, 2
api.client, 1
api.utils, 2

INDEX

A

`api`
 module, 2
`api.client`
 module, 1
`api.utils`
 module, 2

H

`here_now()` (*in module `api.utils`*), 2

K

`KNOWN_GOOD_API_VERSION` (*`api.client.SparclApi` attribute*), 1

M

module
 `api`, 2
 `api.client`, 1
 `api.utils`, 2

O

`objform()` (*in module `api.utils`*), 2

R

`retrieve()` (*`api.client.SparclApi` method*), 1

S

`sample_sids()` (*`api.client.SparclApi` method*), 1
`SparclApi` (*class in `api.client`*), 1

T

`tic()` (*in module `api.utils`*), 2
`toc()` (*in module `api.utils`*), 2

V

`version()` (*`api.client.SparclApi` property*), 2