GreenSpaces Authorization Service Documentation

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This application will demonstrate how to provide authorization to other GreenSpaces clients to access GreenSpaces resource through a GreenSpaces resource server.

The Demonstrations will be performed through the Spring Rest Docs from the applications lightweight tests.

The lightweight ClientControllerTest makes calls to the client service of this application to produce the following documentation snippets.

Creating a user

cURL Request:

```
$ curl 'http://localhost:8080/users?_csrf=bJ7glA-
u9qD9MOedW1ljgLTivFknBwFfvztEqlDRTnOh1HhjX_zW9m3IlZLQBdSsanRX44HakWBCMGJyhgwhzmnkL0XE4
h5T' -i -X POST \
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '{
  "id" : "b583b456-9300-4cbd-4bcd-199225f5d42c",
  "username" : "user.test@mail.com",
  "password" : "13Tm31n@16351t3001",
  "roles" : [ {
    "id" : 1,
    "role" : "ADMIN",
    "authorities" : [ {
      "id" : 3,
      "authority" : "execute"
    }, {
      "id" : 2,
      "authority" : "write"
    }, {
      "id" : 1,
      "authority" : "read"
    } ]
  } ],
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}'
```

Httpie Request:

```
$ echo '{
  "id" : "b583b456-9300-4cbd-4bcd-199225f5d42c",
  "username" : "user.test@mail.com",
  "password" : "13Tm31n@16351t3001",
  "roles" : [ {
    "id" : 1,
    "role" : "ADMIN",
    "authorities" : [ {
      "id" : 3,
      "authority" : "execute"
    }, {
      "id" : 2,
      "authority" : "write"
    }, {
```

```
        "id" : 1,
        "authority" : "read"
      } ]
   } ],
   "enabled" : true,
   "accountNonLocked" : true,
   "credentialsNonExpired" : true,
   "accountNonExpired" : true
}' | http POST 'http://localhost:8080/users?_csrf=bJ7glA-
u9qD9MOedW1ljgLTivFknBwFfvztEqlDRTnOh1HhjX_zW9m3IlZLQBdSsanRX44HakWBCMGJyhgwhzmnkL0XE4
h5T' \
     'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
POST /users?_csrf=bJ7glA-
u9qD9MOedW1ljgLTivFknBwFfvztEqlDRTnOh1HhjX_zW9m3IlZLQBdSsanRX44HakWBCMGJyhgwhzmnkL0XE4
h5T HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 502
Host: localhost:8080

{
  "id" : "b583b456-9300-4cbd-4bcd-199225f5d42c",
  "username" : "user.test@mail.com",
  "password" : "13Tm31n@16351t3001",
  "roles" : [ {
    "id" : 1,
    "role" : "ADMIN",
    "authorities" : [ {
      "id" : 3,
      "authority" : "execute"
    }, {
      "id" : 2,
      "authority" : "write"
    }, {
      "id" : 1,
      "authority" : "read"
    } ]
  } ],
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}
```

```
HTTP/1.1 201 Created
Content-Type: application/json
```

```
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 308

{"id":"b583b456-9300-4cbd-4bcd-
199225f5d42c","username":"user.test@mail.com","roles":[{"id":1,"role":"ADMIN","authori
ties":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority"
:"read"}]}],"enabled":true,"accountNonLocked":true,"credentialsNonExpired":true,"accou
ntNonExpired":true}
```

Requests and Responses:

```
{
  "id" : "b583b456-9300-4cbd-4bcd-199225f5d42c",
  "username" : "user.test@mail.com",
  "password" : "13Tm31n@16351t3001",
  "roles" : [ {
    "id" : 1,
    "role" : "ADMIN",
    "authorities" : [ {
      "id" : 3,
      "authority" : "execute"
    }, {
      "id" : 2,
      "authority" : "write"
    }, {
      "id" : 1,
      "authority" : "read"
    } ]
  } ],
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}
```

Path	Type	Description
username	class java.lang.String	username of the user to be save
password	class java.lang.String	password of the user to save
roles	interface java.util.Set	roles of the user to be saved
roles.[].id	class java.lang.Integer	role id of a single role within roles of the user to be saved

Path	Type	Description
roles.[].role	class java.lang.String	role name of a single role within roles of a single role within roles of the user to be saved
roles.[].authorities	interface java.util.Set	authorities within a single role of roles of the user to be saved
roles.[].authorities.[].id	class java.lang.Integer	id of a authority within a role of roles of the user to be saved
roles.[].authorities.[].authority	class java.lang.String	authority name of an authority within a role of roles of the user to be saved
enabled	class java.lang.Boolean	status describing if the user account is enabled
credentialsNonExpired	class java.lang.Boolean	status describing the validity of user's credentials
accountNonExpired	class java.lang.Boolean	Status describing user's account validity
accountNonLocked	class java.lang.Boolean	Status describing whether user's account is locked or unlocked

```
{"id":"b583b456-9300-4cbd-4bcd-
199225f5d42c","username":"user.test@mail.com","roles":[{"id":1,"role":"ADMIN","authori
ties":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority"
:"read"}]}],"enabled":true,"accountNonLocked":true,"credentialsNonExpired":true,"accou
ntNonExpired":true}
```

Retrieving a user by id

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c' -i -X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /users/b583b456-9300-4cbd-4bcd-199225f5d42c HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 308

{"id":"b583b456-9300-4cbd-4bcd-
199225f5d42c","username":"user.test@mail.com","roles":[{"id":1,"role":"ADMIN","authori
ties":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority"
:"read"}]}],"enabled":true,"accountNonLocked":true,"credentialsNonExpired":true,"accou
ntNonExpired":true}
```

Request Parameters:

Table 1. /users/{id}

Parameter	Description
`id`	UUID of the user to retrieve

Requests and Responses:

{"id":"b583b456-9300-4cbd-4bcd-
199225f5d42c","username":"user.test@mail.com","roles":[{"id":1,"role":"ADMIN","authori
ties":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority"
:"read"}]}],"enabled":true,"accountNonLocked":true,"credentialsNonExpired":true,"accou
ntNonExpired":true}

Path	Type	Description
id	String	UUID of the retrieved user
username	class java.lang.String	username of the user to be save
roles	interface java.util.Set	roles of the user to be saved
roles.[].id	class java.lang.Integer	role id of a single role within roles of the user to be saved
roles.[].role	class java.lang.String	role name of a single role within roles of a single role within roles of the user to be saved
roles.[].authorities	interface java.util.Set	authorities within a single role of roles of the user to be saved
roles.[].authorities.[].id	class java.lang.Integer	id of a authority within a role of roles of the user to be saved
roles.[].authorities.[].author ity	class java.lang.String	authority name of an authority within a role of roles of the user to be saved
enabled	class java.lang.Boolean	status describing if the user account is enabled
credentialsNonExpired	class java.lang.Boolean	status describing the validity of user's credentials
accountNonExpired	class java.lang.Boolean	Status describing user's account validity
accountNonLocked	class java.lang.Boolean	Status describing whether user's account is locked or unlocked

Retrieving a user's Role

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles/1' -i
-X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles/1'
\
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles/1 HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 127

{"id":1,"role":"ADMIN","authorities":[{"id":3,"authority":"execute"},{"id":2,"authorit
y":"write"},{"id":1,"authority":"read"}]}
```

Request Parameters:

Table 2. /users/{id}/roles/{roleId}

Parameter	Description
id	UUID of the user with role to retrieve
roleId	id of role to retrieve

Requests and Responses:

{"id":1,"role":"ADMIN","authorities":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority":"read"}]}

Path	Type	Description
id	class java.lang.Integer	id of a role
role	class java.lang.String	role name
authorities	interface java.util.Set	authorities within this role
authorities.[].id	class java.lang.Integer	id of an authority within a role of roles
authorities.[].authority	class java.lang.String	authority name of an authority within a role

Retrieving a user's Roles

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles' -i -X
GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 129

[{"id":1,"role":"ADMIN","authorities":[{"id":3,"authority":"execute"},{"id":2,"authori
ty":"write"},{"id":1,"authority":"read"}]}]
```

Request Parameters:

Table 3. /users/{id}/roles

Parameter	Description
id	UUID of the user to retrieve

Requests and Responses:

```

```

```
[{"id":1,"role":"ADMIN","authorities":[{"id":3,"authority":"execute"},{"id":2,"authori
```

```
ty":"write"},{"id":1,"authority":"read"}]}]
```

Path	Type	Description
`[].id`	`class java.lang.Integer`	id of a role within roles of the user
`[].role`	`class java.lang.String`	role name of role within roles of a user
`[].authorities`	`interface java.util.Set`	authorities within a single role of roles
`[].authorities.[].id`	`class java.lang.Integer`	id of authority within a role of roles
`[].authorities.[].authority`	`class java.lang.String`	authority name of an authority within a role of roles

Retrieving a User's Authority

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/1/authorities/1' -i -X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/1/authorities/1' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles/1/authorities/1 HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 27

{"id":1,"authority":"read"}
```

Request Parameters:

Table 4. /users/{id}/roles/{roleId}/authorities/{authorityId}

Parameter	Description
id	UUID of the user with authority to retrieve
roleId	id of role associated with the authority to be retrieved
authorityId	id of the authority to retrieve

Requests and Responses:

{"id":1,"authority":"read"}

Path	Type	Description
id	class java.lang.Integer	id of the authority to retrieve
authority	class java.lang.String	authority name of an authority to retrieve

Retrieving a User's Authorities

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/authorities' -i -X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/authorities' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /users/b583b456-9300-4cbd-4bcd-199225f5d42c/roles/authorities HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 89

[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority":"read
"}]
```

Request Parameters:

Table 5. /users/{id}/roles/authorities

Parameter	Description
id	id of the user associated with retrieved authorities

Requests and Responses:

[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority":"read"}]

Path	Type	Description
[].id	Number	id of an authority within list of authorities retrieved
[].authority	String	authority name of an authority within list of authorities retrieved

Retrieving all Users

cURL Request:

```
$ curl 'http://localhost:8080/users' -i -X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/users' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /users HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 310

[{"id":"b583b456-9300-4cbd-4bcd-
199225f5d42c","username":"user.test@mail.com","roles":[{"id":1,"role":"ADMIN","authori
ties":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority"
:"read"}]}],"enabled":true,"accountNonLocked":true,"credentialsNonExpired":true,"accou
ntNonExpired":true}]
```

Requests and Responses:

```

```

```
[{"id":"b583b456-9300-4cbd-4bcd-
199225f5d42c","username":"user.test@mail.com","roles":[{"id":1,"role":"ADMIN","authori
ties":[{"id":3,"authority":"execute"},{"id":2,"authority":"write"},{"id":1,"authority"
:"read"}]}],"enabled":true,"accountNonLocked":true,"credentialsNonExpired":true,"accou
ntNonExpired":true}]
```

Path	Type	Description
[].id	String	UUID of the retrieved user
[].username	class java.lang.String	username of the user to be save
[].roles	interface java.util.Set	roles of the user to be saved
[].roles.[].id	class java.lang.Integer	role id of a single role within roles of the user to be saved
[].roles.[].role	class java.lang.String	role name of a single role within roles of a single role within roles of the user to be saved
[].roles.[].authorities	interface java.util.Set	authorities within a single role of roles of the user to be saved
[].roles.[].authorities.[].id	class java.lang.Integer	id of a authority within a role of roles of the user to be saved
[].roles.[].authorities.[].authority	class java.lang.String	authority name of an authority within a role of roles of the user to be saved
[].enabled	class java.lang.Boolean	status describing if the user account is enabled
[].credentialsNonExpired	class java.lang.Boolean	status describing the validity of user's credentials
[].accountNonExpired	class java.lang.Boolean	Status describing user's account validity
[].accountNonLocked	class java.lang.Boolean	Status describing whether user's account is locked or unlocked

Updating a User (Adding Authorities to User)

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/1/authorities?_csrf=nj38kU54vdi2ABxRNfFp-D4xkFtfCzLL-
hHW8hE4zn524Tg5rwXI9HpA2O2bN3llDdxdzQYFvTk5bVbmyyC0wXUJrxtD2FkA' -i -X PATCH \
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '[ {
  "id" : 2,
  "authority" : "update"
} ]'
```

Httpie Request:

```
$ echo '[ {
  "id" : 2,
  "authority" : "update"
} ]' | http PATCH 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/1/authorities?_csrf=nj38kU54vdi2ABxRNfFp-D4xkFtfCzLL-
hHW8hE4zn524Tg5rwXI9HpA2O2bN3llDdxdzQYFvTk5bVbmyyC0wXUJrxtD2FkA' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
PATCH /users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles/1/authorities?_csrf=nj38kU54vdi2ABxRNfFp-D4xkFtfCzLL-
hHW8hE4zn524Tg5rwXI9HpA2O2bN3llDdxdzQYFvTk5bVbmyyC0wXUJrxtD2FkA HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 47
Host: localhost:8080

[ {
  "id" : 2,
  "authority" : "update"
} ]
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
```

Request Parameters:

Table 6. /users/{id}/roles/{roleId}/authorities

Parameter	Description
id	UUID of the user adding authorities
roleId	id of the role to add the authorities

Requests and Responses:

```
[ {
  "id" : 2,
  "authority" : "update"
} ]
```

Path	Type	Description
[].authority	String	authority name of authority within authorities to add

Updating a User (Adding Roles to User)

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles?_csrf=tBZRHLLak1k6Hb7eQi87ky43i37Zeo2LajitQf1hYUAS2rX_giBjKtHi8mEXe
4_pdwIPpUpUpka4HO6mUlmYc84CU3YkuITG' -i -X PATCH \
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '[ {
  "id" : 2,
  "role" : "USER",
  "authorities" : null
} ]'
```

Httpie Request:

```
$ echo '[ {
  "id" : 2,
  "role" : "USER",
  "authorities" : null
} ]' | http PATCH 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles?_csrf=tBZRHLLak1k6Hb7eQi87ky43i37Zeo2LajitQf1hYUAS2rX_giBjKtHi8mEXe
4_pdwIPpUpUpka4HO6mUlmYc84CU3YkuITG' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
PATCH /users/b583b456-9300-4cbd-4bcd-
199225f5d42c/roles?_csrf=tBZRHLLak1k6Hb7eQi87ky43i37Zeo2LajitQf1hYUAS2rX_giBjKtHi8mEXe
4_pdwIPpUpUpka4HO6mUlmYc84CU3YkuITG HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 65
Host: localhost:8080

[ {
  "id" : 2,
  "role" : "USER",
  "authorities" : null
} ]
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
```

```
X-Frame-Options: DENY
```

Request Parameters:

Table 7. /users/{id}/roles

Parameter	Description
id	UUID of the user with roles to be retrieved

Requests and Responses:

```
[ {
  "id" : 2,
  "role" : "USER",
  "authorities" : null
} ]
```

Updating a User's account status

cURL Request:

```
$ curl 'http://localhost:8080/users/accounts/b583b456-9300-4cbd-4bcd-
199225f5d42c?_csrf=msYQuHhBciXcnniaTFNysimVajiIAl49dxbVxShRZ1SuLQZ3-fQnjhx0RRzxqxr-
fn5GgR6hR1m_MmoQQHPtoxllAW2XGzNF' -i -X PATCH \
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '{
  "id" : null,
  "username" : "user.test@mail.com",
  "password" : null,
  "roles" : null,
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}'
```

Httpie Request:

```
$ echo '{
  "id" : null,
  "username" : "user.test@mail.com",
  "password" : null,
  "roles" : null,
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}' | http PATCH 'http://localhost:8080/users/accounts/b583b456-9300-4cbd-4bcd-
199225f5d42c?_csrf=msYQuHhBciXcnniaTFNysimVajiIAl49dxbVxShRZ1SuLQZ3-fQnjhx0RRzxqxr-
fn5GgR6hR1m_MmoQQHPtoxllAW2XGzNF' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
PATCH /users/accounts/b583b456-9300-4cbd-4bcd-
199225f5d42c?_csrf=msYQuHhBciXcnniaTFNysimVajiIAl49dxbVxShRZ1SuLQZ3-fQnjhx0RRzxqxr-
fn5GgR6hR1m_MmoQQHPtoxllAW2XGzNF HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 215
Host: localhost:8080

{
  "id" : null,
  "username" : "user.test@mail.com",
```

```
  "password" : null,
  "roles" : null,
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
```

Request Parameters:

Table 8. /users/accounts/{id}

Parameter	Description
id	Id of the user account status to update

Requests and Responses:

```
{
  "id" : null,
  "username" : "user.test@mail.com",
  "password" : null,
  "roles" : null,
  "enabled" : true,
  "accountNonLocked" : true,
  "credentialsNonExpired" : true,
  "accountNonExpired" : true
}
```

Updating a User's Password

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/accounts/password-reset?_csrf=ApmB7tFQ2lj89oJQjoLvT8-
_q8pm97anfZmBsLOhCBgF78NLMv2x2bJn7GzRx7dpvq_bLfyIhvIFwtCKTf-2g4KVaSAz3vR-' -i -X PATCH
\
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '{
  "id" : null,
  "username" : "user.test@mail.com",
  "password" : "P@55w07d4t35t",
  "roles" : null,
  "enabled" : false,
  "accountNonLocked" : false,
  "credentialsNonExpired" : false,
  "accountNonExpired" : false
}'
```

Httpie Request:

```
$ echo '{
  "id" : null,
  "username" : "user.test@mail.com",
  "password" : "P@55w07d4t35t",
  "roles" : null,
  "enabled" : false,
  "accountNonLocked" : false,
  "credentialsNonExpired" : false,
  "accountNonExpired" : false
}' | http PATCH 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-
199225f5d42c/accounts/password-reset?_csrf=ApmB7tFQ2lj89oJQjoLvT8-
_q8pm97anfZmBsLOhCBgF78NLMv2x2bJn7GzRx7dpvq_bLfyIhvIFwtCKTf-2g4KVaSAz3vR-' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
PATCH /users/b583b456-9300-4cbd-4bcd-199225f5d42c/accounts/password-
reset?_csrf=ApmB7tFQ2lj89oJQjoLvT8-
_q8pm97anfZmBsLOhCBgF78NLMv2x2bJn7GzRx7dpvq_bLfyIhvIFwtCKTf-2g4KVaSAz3vR- HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 230
Host: localhost:8080

{
  "id" : null,
```

```
    "username" : "user.test@mail.com",
    "password" : "P@55w07d4t35t",
    "roles" : null,
    "enabled" : false,
    "accountNonLocked" : false,
    "credentialsNonExpired" : false,
    "accountNonExpired" : false
}
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
```

Request Parameters:

Table 9. /users/{id}/accounts/password-reset

Parameter	Description
id	Id of the user with password to reset

Requests and Responses:

```
{
    "id" : null,
    "username" : "user.test@mail.com",
    "password" : "P@55w07d4t35t",
    "roles" : null,
    "enabled" : false,
    "accountNonLocked" : false,
    "credentialsNonExpired" : false,
    "accountNonExpired" : false
}
```

Path	Type	Description
username	class java.lang.String	username of the user to be save
password	class java.lang.String	password of the user to save

Deleting a User

cURL Request:

```
$ curl 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c' -i -X DELETE \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http DELETE 'http://localhost:8080/users/b583b456-9300-4cbd-4bcd-199225f5d42c' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
DELETE /users/b583b456-9300-4cbd-4bcd-199225f5d42c HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
```

Request Parameters:

Table 10. /users/{id}

Parameter	Description
id	Id of the user to delete

Requests and Responses:

Creating a Client

cURL Request:

```
$ curl
'http://localhost:8080/clients?_csrf=QpzkTIHKtOPQ9SYD1YmqyNuCX5hzk5xc6VUz3bBwR4G-
pYOdJ6XXL7Kv19b9xkU34qSe_Om2cqEXo6xxj2QC5IgWJbDYkLes' -i -X POST \
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
  } ],
  "tokenSettings" : {
    "id" : 1,
    "format" : "self-contained",
    "accessTokenTTL" : 30
  }
}'
```

Httpie Request:

```
$ echo '{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
```

```
      "id" : 1,
      "grantType" : "authorization_code"
    } ],
    "redirectUris" : [ {
      "id" : 1,
      "uri" : "http://127.0.0.1:1000"
    } ],
    "scopes" : [ {
      "id" : 1,
      "scope" : "openid"
    } ],
    "tokenSettings" : {
      "id" : 1,
      "format" : "self-contained",
      "accessTokenTTL" : 30
    }
}' | http POST
'http://localhost:8080/clients?_csrf=QpzkTIHKtOPQ9SYD1YmqyNuCX5hzk5xc6VUz3bBwR4G-
pYOdJ6XXL7Kv19b9xkU34qSe_Om2cqEXo6xxj2QC5IgWJbDYkLes' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
POST /clients?_csrf=QpzkTIHKtOPQ9SYD1YmqyNuCX5hzk5xc6VUz3bBwR4G-
pYOdJ6XXL7Kv19b9xkU34qSe_Om2cqEXo6xxj2QC5IgWJbDYkLes HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 539
Host: localhost:8080

{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
  } ],
```

```
      "tokenSettings" : {
        "id" : 1,
        "format" : "self-contained",
        "accessTokenTTL" : 30
      }
    }
  }
```

```
HTTP/1.1 201 Created
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 337

{"id":"001i","clientId":"001ci","name":"Client03","authenticationMethods":[{"id":1,"me
thod":"client_secret_basic"}],"grantTypes":[{"id":1,"grantType":"authorization_code"}]
,"redirectUris":[{"id":1,"uri":"http://127.0.0.1:1000"}],"scopes":[{"id":1,"scope":"op
enid"}],"tokenSettings":{"id":1,"format":"self-contained","accessTokenTTL":30}}
```

Requests and Responses:

```
{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
  } ],
  "tokenSettings" : {
    "id" : 1,
    "format" : "self-contained",
```

```
        "accessTokenTTL" : 30
    }
  }
```

Path	Type	Description
name	class java.lang.String	Desired client name
secret	class java.lang.String	Desired client secret
authenticationMethods	interface java.util.Set	Authentication Methods of the client
authenticationMethods.[].method	class java.lang.String	Authentication method name of an authentication method of the client
grantTypes	interface java.util.Set	Desired list/set of auth2.0 authentication grant types
grantTypes.[].grantType	class java.lang.String	authorization grant type name of a grant type within a list of grant types
redirectUris	class java.lang.String	Desired list/set of redirect URIs
redirectUris.[].uri	class java.lang.String	redirect uri within a list of redirect uris
scopes	interface java.util.Set	Desired oauth2.0 authentication scopes
scopes.[].scope	class java.lang.String	Scope's name within a list of scopes
tokenSettings	class com.daveace.greenspaces.tokensettings.TokenSettings	Desired oauth2.0 token settings
tokenSettings.format	String	Format of the token from the authorization server
tokenSettings.accessTokenTTL	Number	Time to live or expiry time of an access token

```
{"id":"001i","clientId":"001ci","name":"Client03","authenticationMethods":[{"id":1,"me
thod":"client_secret_basic"}],"grantTypes":[{"id":1,"grantType":"authorization_code"}]
,"redirectUris":[{"id":1,"uri":"http://127.0.0.1:1000"}],"scopes":[{"id":1,"scope":"op
enid"}],"tokenSettings":{"id":1,"format":"self-contained","accessTokenTTL":30}}
```

Path	Type	Description
id	String	id of created client
clientId	String	client id of created client

Path	Type	Description
name	String	name of created client
authenticationMethods	interface java.util.Set	Authentication Methods of the client
authenticationMethods.[].method	class java.lang.String	Authentication method name of an authentication method of the client
grantTypes	Array	Grant types of the created clients
grantTypes.[].grantType	class java.lang.String	authorization grant type name of a grant type within a list of grant types
redirectUris	Array	Redirect URIs of the created client
redirectUris.[].uri	class java.lang.String	redirect uri within a list of redirect uris
scopes	Array	Oauth2.0 Scopes of the create client
scopes.[].scope	class java.lang.String	Scope's name within a list of scopes
tokenSettings	Object	Token Settings of the create client
tokenSettings.format	String	Format of the token from the authorization server
tokenSettings.accessTokenTTL	Number	Time to live or expiry time of an access token

Retrieving a Client

cURL Request:

```
$ curl 'http://localhost:8080/clients/001i' -i -X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/clients/001i' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /clients/001i HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 337

{"id":"001i","clientId":"001ci","name":"Client03","authenticationMethods":[{"id":1,"me
thod":"client_secret_basic"}],"grantTypes":[{"id":1,"grantType":"authorization_code"}]
,"redirectUris":[{"id":1,"uri":"http://127.0.0.1:1000"}],"scopes":[{"id":1,"scope":"op
enid"}],"tokenSettings":{"id":1,"format":"self-contained","accessTokenTTL":30}}
```

Request Parameters:

Table 11. /clients/{id}

Parameter	Description
id	UUID of client to retrieve

Requests and Responses:

```
{"id":"001i","clientId":"001ci","name":"Client03","authenticationMethods":[{"id":1,"me
thod":"client_secret_basic"}],"grantTypes":[{"id":1,"grantType":"authorization_code"}]
,"redirectUris":[{"id":1,"uri":"http://127.0.0.1:1000"}],"scopes":[{"id":1,"scope":"op
enid"}],"tokenSettings":{"id":1,"format":"self-contained","accessTokenTTL":30}}
```

Path	Type	Description
id	String	id of retrieved client
clientId	String	client id of retrieved client
name	String	name of retrieved client
authenticationMethods	interface java.util.Set	Authentication Methods of the retrieved client
authenticationMethods.[].id	class java.lang.Integer	Id of an authentication method of the retrieved client
authenticationMethods.[].method	class java.lang.String	Authentication method name of an authentication method in the retrieved client
grantTypes	Array	Grant types of the retrieved clients
grantTypes.[].grantType	class java.lang.String	authorization grant type name of a grant type within a list of grant types
redirectUris	Array	Redirect URIs of the retrieved client
redirectUris.[].uri	class java.lang.String	redirect uri within a list of redirect uris
scopes	Array	Oauth2.0 Scopes of the retrieved client
scopes.[].scope	class java.lang.String	Scope's name within a list of scopes
tokenSettings	Object	Token Settings of the retrieved client
tokenSettings.id	Number	id of the token setting from the authorization server
tokenSettings.format	String	Format of the token from the authorization server
tokenSettings.accessTokenTTL	Number	Time to live or expiry time of an access token

Retrieving all Clients

cURL Request:

```
$ curl 'http://localhost:8080/clients' -i -X GET \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http GET 'http://localhost:8080/clients' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
GET /clients HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
Content-Type: application/json
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
Content-Length: 339

[{"id":"001i","clientId":"001ci","name":"Client03","authenticationMethods":[{"id":1,"m
ethod":"client_secret_basic"}],"grantTypes":[{"id":1,"grantType":"authorization_code"}
],"redirectUris":[{"id":1,"uri":"http://127.0.0.1:1000"}],"scopes":[{"id":1,"scope":"o
penid"}],"tokenSettings":{"id":1,"format":"self-contained","accessTokenTTL":30}}]
```

Requests and Responses:

```

```

```
[{"id":"001i","clientId":"001ci","name":"Client03","authenticationMethods":[{"id":1,"m
ethod":"client_secret_basic"}],"grantTypes":[{"id":1,"grantType":"authorization_code"}
],"redirectUris":[{"id":1,"uri":"http://127.0.0.1:1000"}],"scopes":[{"id":1,"scope":"o
penid"}],"tokenSettings":{"id":1,"format":"self-contained","accessTokenTTL":30}}]
```

Path	Type	Description
[].id	class java.lang.Integer	id of retrieved client within a list of clients
[].clientId	class java.lang.String	client id of a retrieved client within a list of clients
[].name	class java.lang.String	name of a retrieved client within a list of clients
[].authenticationMethods	interface java.util.Set	Authentication Methods of a retrieved client within a list of clients
[].authenticationMethods.[].id	class java.lang.Integer	id of one of the authentication methods of a retrieved client within a list of clients
[].authenticationMethods.[].method	class java.lang.String	One of the authentication methods' name of a retrieved client within a list of clients
[].grantTypes	interface java.util.Set	Grant types of a retrieved client within a list of clients
[].grantTypes.[].id	class java.lang.Integer	id of a Grant type of the retrieved clients
[].grantTypes.[].grantType	class java.lang.String	Grant type name of one of the retrieved clients
[].redirectUris	interface java.util.Set	Redirect URIs of a retrieved client within a list of clients
[].redirectUris.[].uri	class java.lang.String	redirect uri within a list of redirect uris
[].scopes	interface java.util.Set	Oauth2.0 Scopes of a retrieved client within a list of clients
[].scopes.[].scope	class java.lang.String	Scope's name within a list of scopes
[].tokenSettings	class com.daveace.greenspaces.tokensettings.TokenSettings	Token Settings of a retrieved client within a list of clients
[].tokenSettings.id	class java.lang.Integer	id of a token setting of a retrieved client within a list of clients
[].tokenSettings.format	class java.lang.String	Format of the token from the authorization server
[].tokenSettings.accessTokenTTL	class java.lang.Integer	Time to live or expiry time of an access token

Updating a Client

cURL Request:

```
$ curl
'http://localhost:8080/clients/001i?_csrf=uoszX_AiaIQNLnuuZazkNcaznjwaIAOt0DIvhfmnvZPw
lK0I27wLbpYXUbMgFkPPVoHQB_eLs14rFTaAtVdJsZ-RjKDApstp' -i -X PATCH \
    -H 'Content-Type: application/json;charset=UTF-8' \
    -d '{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
  } ],
  "tokenSettings" : {
    "id" : 1,
    "format" : "self-contained",
    "accessTokenTTL" : 30
  }
}'
```

Httpie Request:

```
$ echo '{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
```

```
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
  } ],
  "tokenSettings" : {
    "id" : 1,
    "format" : "self-contained",
    "accessTokenTTL" : 30
  }
}' | http PATCH
'http://localhost:8080/clients/001i?_csrf=uoszX_AiaIQNLnuuZazkNcaznjwaIAOt0DIvhfmnvZPw
lK0I27wLbpYXUbMgFkPPVoHQB_eLs14rFTaAtVdJsZ-RjKDApstp' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
PATCH
/clients/001i?_csrf=uoszX_AiaIQNLnuuZazkNcaznjwaIAOt0DIvhfmnvZPwlK0I27wLbpYXUbMgFkPPVo
HQB_eLs14rFTaAtVdJsZ-RjKDApstp HTTP/1.1
Content-Type: application/json;charset=UTF-8
Content-Length: 539
Host: localhost:8080

{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
```

```
    } ],
    "tokenSettings" : {
      "id" : 1,
      "format" : "self-contained",
      "accessTokenTTL" : 30
    }
}
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
```

Request Parameters:

Table 12. /clients/{id}

Parameter	Description
id	UUID of the client to update

Requests and Responses:

```
{
  "id" : "001i",
  "clientId" : "001ci",
  "name" : "Client03",
  "secret" : "53cr3t50$9feW1t6m3",
  "authenticationMethods" : [ {
    "id" : 1,
    "method" : "client_secret_basic"
  } ],
  "grantTypes" : [ {
    "id" : 1,
    "grantType" : "authorization_code"
  } ],
  "redirectUris" : [ {
    "id" : 1,
    "uri" : "http://127.0.0.1:1000"
  } ],
  "scopes" : [ {
    "id" : 1,
    "scope" : "openid"
  } ],
  "tokenSettings" : {
    "id" : 1,
    "format" : "self-contained",
```

```
      "accessTokenTTL" : 30
    }
  }
```

Path	Type	Description
name	class java.lang.String	Desired client name of client to be updated
secret	class java.lang.String	Desired client secret of client to be updated
authenticationMethods	interface java.util.Set	Desired oauth2.0 authentication methods of client to be updated
authenticationMethods.[].method	class java.lang.String	Authentication method name of desired oauth2.0 authentication methods of client to be updated
grantTypes	interface java.util.Set	Desired list/set of auth2.0 authentication grant types of client to be updated
grantTypes.[].grantType	String	Authorization grant type of the client to be updated
redirectUris	class java.lang.String	Desired list/set of redirect URIs of client to be updated
redirectUris.[].uri	class java.lang.String	A redirect Uri of the client to be updated
scopes	interface java.util.Set	Desired oauth2.o authentication scopes of client to be updated
scopes.[].scope	class java.lang.String	A scope of the client to be updated
tokenSettings	class com.daveace.greenspaces.tokensettings.TokenSettings	Desired oauth2.0 token settings of client to be updated
tokenSettings.format	class java.lang.String	Format of the access token of the client to be updated
tokenSettings.accessTokenTTL	class java.lang.Integer	Expiry time of the access token of the client to be updated

Deleting a Client

cURL Request:

```
$ curl 'http://localhost:8080/clients/001i' -i -X DELETE \
    -H 'Content-Type: application/json;charset=UTF-8'
```

Httpie Request:

```
$ http DELETE 'http://localhost:8080/clients/001i' \
    'Content-Type:application/json;charset=UTF-8'
```

Http Request:

```
DELETE /clients/001i HTTP/1.1
Content-Type: application/json;charset=UTF-8
Host: localhost:8080
```

```
HTTP/1.1 200 OK
X-Content-Type-Options: nosniff
X-XSS-Protection: 0
Cache-Control: no-cache, no-store, max-age=0, must-revalidate
Pragma: no-cache
Expires: 0
X-Frame-Options: DENY
```

Request Parameters:

Table 13. /clients/{id}

Parameter	Description
id	UUID of client to delete

Requests and Responses: