

# Storelt Protocol v0.4

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## 1. Introduction

Hello, this is the documentation for the Storelt protocol. It is used to communicate with our server. We will be implementing this protocol on top of WEBSOCKETS to enjoy its messaging model. Everything should be JSON objects.

## 2. The JSON data structures

### 2.1 Command

```
{
  "uid": unique_command_id,
  "command": command_name,
  "parameters": {
    "parameter1Name": parameter1,
    "parameter2Name": parameter2,
  }
}
```

### 2.2 Response

```
{
  "code": code,
  "text": response_message,
  "commandUid": command_id,
  "command": "RESP",
  (optional) "parameters": {
    ...
  }
}
```

TODO: document possible errors.

### 2.3 Commands

#### JOIN

From a client to the server. This is the first request to make whenever a client wants to get online.

```
{
  "uid": 263,
  "command": "JOIN",
  "parameters": {
    "authType": "fb",
    "accessToken": "34j8b4jhb343hbKJH54",
  }
}
```

The response will contain a FILE object named "home". Example :

```
{
  "code": 0,
  "text": "welcome",
  "commandUid": 42,
  "command": "JOIN",
  "parameters": {
    "home": FILEObject
  }
}
```

## FDEL

From a client or the server. Delete a file/directory.

```
{
  "uid": 765,
  "command": "FDEL",
  "parameters": {
    "files": ["/a.txt", "/archive/b.txt", "/dir"]
  }
}
```

## FADD

From a client or a server. Add a file to the user three.

```
{
  "uid": 766,
  "command": "FADD",
  "parameters": {
    "files": [FILEObject, ...]
  }
}
```

## FUPT

From a client or a server. Update a file.

```
{
  "uid": 767,
  "command": "FUPT",
  "parameters": {
    "files": [FILEObject, ...]
  }
}
```

## FMOV

From a client or a server. move or rename a file.

```
{
  "uid": 768,
  "command": "FMOV",
  "parameters": {
    "src": "/foo/bar.txt"
    "dest": "/foo/toto.txt"
  }
}
```

If you are moving a file, please don't omit the file name in the destination. For example :

DON'T DO:

```
{
  "src": "/foo/bar"
  "dest": "/target/"
}
```

expecting to move /foo/bar into /target/bar

DO:

```
{
  "src": "/foo/bar"
  "dest": "/target/bar"
}
```

## 2.4 FILE object

This object describe a file or a directory.

```
{
  "path": "/foo/bar",
  "metadata": metadata,
  "IPFSHash": "IPFS hash of all the data in the file",
  "isDir": true,
  "files": {
    "foo.txt": FILEObject,
    "someDirectory": FILEObject,
  }
}
```