Protocol Definition

September 25, 2016

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1 Overview

1.1 Client Actions

Clients will send messages to the server in the following format:

```
{
    "command": "COMMANDNAME",
    "args": ["arg1", "arg2"]
}
```

1.2 Server Actions

Clients will receive messages from the server in the following format:

```
{
    "user": "username",
    "command": "COMMANDNAME",
    "args": ["arg1", "arg2"],
    "timestamp": 1326439500 // Unix Timestamp
}
```

2 WebSocket Protocol Definition

2.1 Client Actions

2.1.1 Message Actions

1. MSG - Send Message

```
{
    "command": "MSG",
    "args": ["channel", "message text goes here"]
}
```

2. PRIVMSG - Send Private Message

```
{
    "command": "PRIVMSG",
    "args": ["user", "message text"]
}
```

2.1.2 Channel Actions

1. JOIN - Join Channel

```
{
    "command": "JOIN",
    "args": ["channel1", "channel2"] // any number of channels
}
```

2. PART - Leave Channel

```
{
    "command": "PART",
    "args": ["channel1", "channel2"]
}
```

3. INVITE - Invite User to Channel

```
{
    "command": "INVITE",
    "args": ["channel", "user1", "user2"] // any number of users
}
```

4. CHANLIST - List Channels on Server

```
{
    "command": "CHANLIST",
    "args": []
}
```

2.1.3 User Actions

1. USER - Set Username

```
{
    "command": "USER",
    "args": ["username"]
}
```

2. USERLIST - List Users on Server

```
{
    "command": "USERLIST",
    "args": []
}
```

2.2 Server Actions

2.2.1 Message Actions

1. MSG - Receive Message From a Channel
```

```
{
    "user": "username",
    "command": "MSG",
    "args": ["channel", "message text goes here"]
    "timestamp": 1326439500 // Unix Timestamp
}
```

2. PRIVMSG - Receive Message From User

```
{
    "user": "username",
    "command": "PRIVMSG",
    "args" ["user", "message text"]
    "timestamp": 1326439500 // unix timestamp
}
```

2.2.2   Channel Actions

1. JOIN - Someone Joined the Channel

```
{
    "user": "anthony",
    "command": "JOIN",
    "args": ["channel1"]
    "timestamp": 1326439500 // Unix Timestamp
}
```

2. PART - Someone Left the Channel

```
{
    "user": "username",
    "command": "PART",
    "args": ["channel"]
    "timestamp": 1326439500 // Unix Timestamp
}
```

3. CHANLIST - Enumerate Channels on Server

```
{
    "user": "",
    "command": "CHANLIST",
    "args": ["chan1", "chan2"] // all channels on server
```

```
        "timestamp": 1326439500 // Unix Timestamp
    }
```

2.2.3   USER Actions

```
{
    "user": "",
    "command": "USERLIST",
    "args": ["user1", "user2"] // all users on server
    "timestamp": 1326439500 // Unix Timestamp
}
```

2.2.4   ERROR

```
{
    "command": "ERROR",
    "args": ["error text"]
}
```