

GO!

CLIENT

- 1 HANDSHAKE + PLAYER_NAME
- 2 MOVE + GAMED_ID + PLAYER_NAME + MOVE_IDX
- 3 PASS + GAME_ID + PLAYER_NAME
- 4 EXIT + GAME_ID + PLAYER_NAME

* optional

SERVER

- 1 ACKNOWLEDGE_HANDSHAKE + GAME_ID + COLOR
- 2 UPDATE_STATUS

Available game statuses

- 1 WAITING
- 2 PLAYING + CUR_PLAYER
- 3 FINISHED + WINNING_PLAYER

FLOW

Player sends handshake to server

- 1 HANDSHAKE + PLAYER_NAME

Server acknowledges player 1

- 1 ACKNOWLEDGE_HANDSHAKE + GAME_ID + IS_LEADER

Server requests config

- 1 REQUEST_CONFIG + REQUEST_CONFIG_MESSAGE

Prefered color/size with commands, if none provided the defaults are used.

- 1 SEND_CONFIG -c COLOR -s SIZE

Server awaits player 2, then sends the acknowledged game. Server broadcasts chosen settings to both players and a status, this could be WAITING or CUR_PLAYER

- 1 ACKNOWLEDGE_CONFIG PLAYER_NAME COLOR SIZE STATUS

After both players have connected the game broadcasts the new status.

```
1 UPDATE_STATUS + STATUS + *PARAM
```

Current player sends a move to the board

```
1 MOVE + GAME_ID + PLAYER_NAME + MOVE_IDX
2 PASS + GAME_ID + PLAYER_NAME
```

Server validates move and sends and acknowledgment or an error

```
1 ACKNOWLEDGE_MOVE + GAME_ID + MOVE + UPDATED_BOARD + NEW_STATUS
2 INVALID_MOVE_EXCEPTION + GAME_ID + NEW_STATUS
```

Parameters

```
1 HANDSHAKE = "HANDSHAKE"
2
3 PLAYER_NAME = String
4
5 MOVE = "MOVE"
6
7 PASS = "PASS"
8
9 COLOR = int
10 // =< 9
11 // 0 EMPTY, 1 BLACK, 2 WHITE, ..., 9 PURPLE;
12
13 GAME_ID = Int
14 // Generated by server
15
16 MOVE_IDX = int
17 // Array idx < N * N, indicates the tile the player wants to put a stone on
18
19 REQUEST_CONFIG = "REQUEST_CONFIG"
20
21 REQUEST_CONFIG_MESSAGE = "Please provide a preferred configuration"
22
23 ACKNOWLEDGE_HANDSHAKE = "ACKNOWLEDGE_HANDSHAKE"
24
25 SEND_CONFIG = "SEND_CONFIG"
26
27 REQUEST_CONFIG = "REQUEST_CONFIG"
28
29 ACKNOWLEDGE_CONFIG = "ACKNOWLEDGE_CONFIG"
30
31 UPDATE_STATUS = "UPDATE_STATUS"
32
33 STATUS = "WAITING", "PLAYING" + String PLAYER_NAME, "FINISHED" + String WINNING_PLA
34 // Game status
35
36 SIZE = Int
37 // Board dimension. e.g. 10 for a 10 * 10 board
38
```

```
39 IS_LEADER = boolean
40 // Indicates the player that can determine the settings
41
42 UPDATED_BOARD = string
43 // String of length n*n where the ith index indicates the status of the ith tile. 0
```