

Client End-to-End Test Procedure

Test 1: Valid Run Basic Matchmaking

1. Create a new account by signing up
2. Click the Games tab in the navbar
3. Enter details for a game, for consistency add the following details:
 - Name: Chess
 - Category: Strategy
 - Players Per Team: 1
 - Teams Per Match: 2
 - Game Parameter 1 Name: Rating
 - Game Parameter 1 Weight: 1
 - Game Parameter 2 Name: Decimal
 - Game Parameter 2 Weight: .5
 - Game Parameter 3 Name: Negative
 - Game Parameter 3 Weight: -.5
4. Click Add game
5. Click on the view button next to the newly created game in the games table
6. Change the value of Game Parameter 1 Weight to 2 and click Update
7. Click on the view button next to the Chess game to ensure your update was successful
8. Click the Delete Game button to ensure functionality
9. Recreate the Chess game using the details mentioned in Step 3
10. Click on the view button next to the newly created game in the games table
11. Scroll down to the Player Ratings section and enter the following values into the given fields:
 - Player Email: player1@gmail.com
 - Parameter 1 Value: 2000
12. Click Add Rating
13. Repeat Steps 11 & 12 three times with the following details:
 - Player Email: player2@gmail.com
 - Parameter 1 Value: 1000
 - Player Email: player3@gmail.com
 - Parameter 1 Value: 500
 - Player Email: player4@gmail.com
 - Parameter 1 Value: -100.5
14. For the player with email player4@gmail.com change their parameter 1 value to 2000.67 and click update
15. For the player with email player4@gmail.com click delete to delete their rating
16. Scroll down to Matchmaking and enter a comma separated list of player emails into the box:
player1@gmail.com,player2@gmail.com,player3@gmail.com
17. Click the Matchmake button and ensure that the output matches player1 and player2

Test 2: Valid Run Advanced Matchmaking

1. Follow steps 1 - 15 in Test 1
2. Click on the Games tab in the navbar
3. Enter details for a game, for consistency add the following details:
 - Name: Checkers
 - Category: Strategy
 - Players Per Team: 1
 - Teams Per Match: 2
 - Game Parameter 1 Name: Rating
 - Game Parameter 1 Weight: 1
4. Click on the view button next to the newly created checkers game
5. Scroll down to the Player Ratings section add the following player ratings:
 - Player Email: player1@gmail.com
 - Parameter 1 Value: 10
 - Player Email: player2@gmail.com
 - Parameter 1 Value: 0
 - Player Email: player3@gmail.com
 - Parameter 1 Value: 20
6. Navigate back to the Chess game by clicking the Games tab in the navbar and then clicking the view button for the Chess Game
7. Scroll down to Matchmaking and enter a comma separated list of player emails into the box:
player1@gmail.com,player2@gmail.com,player3@gmail.com
8. Click the Matchmake button with the Basic option selected and ensure that the output matches player1 and player2
9. Select the Advanced option above the matchmaking box and click the Matchmake button, ensuring the output matches player1 and player3

Test 3: Valid Run Advanced Matchmaking Across Developers

1. Follow steps 1 - 15 in Test 1
2. Open a new browser or go to an incognito tab so that you are logged out
3. Signup/Login as a different user
4. Follow steps 2-5 in Test 2
5. Go back to your initial browser for the developer that created the Chess game and then follow steps 6-9 in Test 2

Test 4: Invalid Auth

1. Create a new account by signing up
2. Logout and try to sign in with incorrect credentials
3. Log in with valid credentials

Test 5: Adding a game with invalid details

1. Signup/login as normal
2. Click the Games tab in the navbar
3. Enter details for a game with an empty name, ensuring it is not allowed:
 - Name:
 - Category: Strategy
 - Players Per Team: 1
 - Teams Per Match: 2
4. Enter details for a game with an empty category, ensuring it is not allowed:
 - Name: Chess
 - Category:
 - Players Per Team: 1
 - Teams Per Match: 2
5. Enter details for a game with an no players per team, ensuring it is not allowed:
 - Name: Chess
 - Category: Strategy
 - Players Per Team:
 - Teams Per Match: 2
6. Enter details for a game with no teams per match, ensuring it is not allowed:
 - Name: Checkers
 - Category: Strategy
 - Players Per Team: 1
 - Teams Per Match:
7. Enter details for a game with an invalid value for player per team, ensuring it is not allowed:
 - Name: Checkers
 - Category: Strategy
 - Players Per Team: 1.1
 - Teams Per Match: 2
8. Enter details for a game with an invalid value for teams per match, ensuring it is not allowed:
 - Name: Checkers
 - Category: Strategy
 - Players Per Team: 1
 - Teams Per Match: 2.1

Test 6: Updating a game with invalid details

1. Create a valid game following 1-4 in Test 1
2. Redo the inputs from Test 4

Test 7: Accessing a Game that you did not create

1. Signup/login as normal
2. Navigate to /games/<invalid game id> and ensure it redirects you back to /games

Test 8: Adding stats for the same player twice

1. Follow steps 1 - 15 in Test 1
2. Attempt to add a rating for player1@gmail.com and ensure that it is not possible

Test 9: Matchmake with players that don't have ratings for current game

1. Follow steps 1 - 15 in Test 1
2. Scroll down to Matchmaking and enter a comma separated list of player emails with a deleted player into the box and ensure that this is not allowed:

player1@gmail.com,player4@gmail.com

Test 10: Expired or Invalid Token

1. Signup/login as normal
2. Wait 1 hour and ensure you are redirected to login page when performing any action