



Poker:

Milestone 3

John Tsiglieris, Kien Ngo, Salvador Godinez, and Bao Than



Game rules

- At least 2 players
- Everyone has two private cards
- Community cards public to anyone
- Players make bets every round
- Strongest hand of cards wins



Endpoints List

Game management:

- Create Game
- Join Game
- Start Game
- Leave Game

In-game actions:

- Ready
- Get Game State (what kind of round are we on? Is the game in lobby state? How much money is in the pot? How many players are there?)
- Act
 - Fold
 - Call
 - Place/Raise Bet
- Send Chat Message

“Act” Endpoint

Purpose: Retrieve current game state for a player. (lobby, flop, preflop, turn, river) and other crucial info.

HTTP Method and Route: POST /api/games/:game_id/bet

State Updates: Update table_player (bet_amount, player_money) Update table (pot_money) Advance turn to next active player

Validations:

- You must be in a game
- Minimum players present
- It is your turn

Edge Cases:

- Preceding player leaves
- Game no longer valid

Events Triggered:

- `game:state:update`
- `game:turn:changed`
- `game:bet:placed`
- `game:bet:call`
- `game:bet:fold`
- `game:balance:update`

“Create Game” Endpoint

Purpose: Create a new game for players to join

HTTP Method and Route: `POST /api/games`

State Updates: Insert new game into game table. Add new row to table, init pot amount, set game state to “lobby” and link to the row in game table.

Validations:

- You must be logged in
- You must not already be in a game

Edge Cases:

- Try to create a game with an invalid number of players.
- Using non number values to set max players

Events Triggered:

- `game:state:update`

Socket.io events with descriptions

Public Events

1. **game:state:update** - Change the round
2. **game:player:joined** - New player joins game
3. **game:player:left** - Player leaves game
4. **game:player:sent_message** - Player sends message to you
5. **game:player:sent_message** - You send a message
6. **game:turn:changed** - Turn moves to next player
7. **game:community:cards:dealt** - Community cards revealed (flop, turn, river)
8. **Game:community:cards:add** - Add a card to community card pile
9. **game:bet:placed** - Player placed a bet
10. **game:bet:call** - Player calls
11. **game:bet:fold** - Player folds
12. **game:ended** - Game finished

Socket.io events with descriptions cont.

Private Events

1. **game:hand:update** - Player's private cards
2. **game:action:required** - Notify player it's their turn
3. **game:balance:update** - Player's money balance changed
4. **game:result:personal** - Personal round results (show total number of wins/losses, money)