Assessment

Write an application that simulates a simplified black lady card game with four players.

● Shuffle 32 cards (with a value of 7 or higher) and distribute the card among the players.
● A randomly picked player starts the game and puts a random card on the table.
● In turns, the other players try to put an as low as possible (suit) matching card on the table. If a player doesn't have a matching card, the player puts a random card on the table.
● When all players have played a card, the player that played the highest matching card loses the round. The total points of all played cards for that round are added to the losing player's total score. Then the next round starts with the next player.
● When all players ran out of cards, the deck will be reshuffled and distributed among the players. The game continues with the next player from the last round.
● When a player has 50 points or more, that game ends and that player has lost the game.
● The game should not be interactive. You simply create a game that follows the rules above.
● The application should be built without use of a framework. Of course you're allowed to use composer and helper packages.

Scores

Card of heart suit: 1 point
Jack of clubs: 2 points
Queen of spades: 5 points
Other cards: 0 points

→ See example output of the application on the next page

Example output of application

The application should output the progress of the game via the console or a simple HTML page. This should look like:

Starting a game with John, Jane, Jan, Otto

John has been dealt: ♦9 ♦10 ♥9 ♠K ♥A ♠A ♦J ♠7
Jane has been dealt: ♠8 ♥7 ♥10 ♣8 ♦Q ♦7 ♠9 ♦8
Jan has been dealt: ♣A ♥J ♥K ♥8 ♣7 ♥Q ♦A ♣10
Otto has been dealt: ♠10 ♣9 ♣K ♦K ♣Q ♠Q ♠J ♣J

Round 1: Jan starts the game Jan plays: ♣7
Otto plays: ♣9
John plays: ♥K
Jane plays: ♣8

Otto played ♣9, the highest matching card of this match and got 1 point added to his total score. Otto's total score is 1 point.

Round 2: Otto start the game

 ...etc

Players ran out of cards. Reshuffle.
John has been dealt: ♠8 ♥7 ♥10 ♣8 ♦Q ♦7 ♠9 ♦8
Jane has been dealt: ♠10 ♣9 ♣K ♦K ♣Q ♠Q ♠J ♦J
Jan has been dealt: ♦9 ♦10 ♣J ♥9 ♠K ♥A ♠A ♣10
Otto has been dealt: ♣A ♥J ♥K ♠7 ♥8 ♣7 ♥Q ♦A

...etc

Jan loses the game! Points:
Jan: 50
Jane: 32
John: 13
Otto: 40