

My Project

- [Main Page](#)
- [Packages](#)
- [Classes](#)
- [Files](#)

-

- [Class List](#)
- [Class Index](#)
- [Class Members](#)

- [Board](#)
- [Board](#)

[Public Member Functions](#) | [Public Attributes](#) | [List of all members](#)

Board.Board Class Reference

Public Member Functions

```
def \_\_init\_\_ (self)
```

```
def getBoard (self)
```

```
def printBoard (self)
```

Public Attributes

[board](#)

Detailed Description

Board class initializes the game board (Board uses the Tile class).

`__init__`: Input:

Function requires a parameter.

Output:

Function will initialize a 6x6 board with tiles.

`getBoard`: Input:

Function requires a parameter.

Output:

Function will return a board.

`printBoard`: Input:

Function requires a parameter.
Output:
Function will print a working board.

State variables:
self (for `__init__`): refers to newly created object
self (for `getBoard`): refers to instance whose method was called
self (for `printBoard`): refers to instance whose method was called.

Environment variables: None for this module.

Exceptions: None for this module.

Constructor & Destructor Documentation

```
def Board.Board.__init__( self )
```

Constructor for Board.

Constructs a 6x6 board with tiles of random colours.

Member Function Documentation

```
def Board.Board.getBoard ( self )
```

Getter method for Board.

```
def Board.Board.printBoard ( self )
```

Method for printing the Board.

Member Data Documentation

Board.Board.board

The documentation for this class was generated from the following file:

- [Board.py](#)
-

Generated by 1.8.10

My Project

- [Main Page](#)
- [Packages](#)
- [Classes](#)
- [Files](#)

-

- [Class List](#)
- [Class Index](#)
- [Class Members](#)

- [Logic](#)
- [Logic](#)

[Public Member Functions](#) | [List of all members](#)

Logic.Logic Class Reference

Public Member Functions

def [removeTile](#) (board, row, col)

def [checkColumn](#) (columnNumber, board)

def [moveDown](#) (columnNumber, board, numEmpty)

def [addTile](#) (board)

def [colourMatch](#) (board, row, col, colour)

def [adjacent](#) (row1, col1, row2, col2)

def [userInput](#) (board)

Detailed Description

This class is responsible for the logic behind the game.

removeTile: Input:
Function requires three parameters.
Output:
Function will remove tile in the given position.

checkColumn: Input:
Function requires two parameters.
Output:
Function will return number of empty spaces in a column.

moveDown: Input:
Function requires three parameters.
Output:
Function will move tiles down to empty positions in a column.

addTile: Input:
Function requires a parameter.
Output:
Function will add tile(s) to empty positions; this function uses checkColumn and moveDown methods.

colourMatch: Input:
Function requires four parameters.
Output:
Function will see if selected tiles are of the same colour or not (boolean).

adjacent: Input:
Function requires four parameters.
Output:
Function will see if selected tiles are adjacent to each other or not (boolean).

userInput: Input:
Function requires a parameter.
Output:
Function will make the board respond to user input.

State variables:
board: used by all, but one method in this module (adjacent does not need to use board)
row: represents a row on the board
col: represents a column on the board
columnNumber: refers to one column (out of 6) on the board
numEmpty: refers to the count of empty positions in a column
colour: refers to colour of a tile
row1 and row2: refer to any two rows on board

col1 and col2: refer to any two columns on the board

Environment variables:

row (in userInput method): based on user interaction with keyboard; user has to enter row number

col (in userInput method): user has to enter column number

contTurn (in userInput method): user can decide to continue with game or quit

Exceptions:

row (in userInput method): row number entered out of range

Row number has to be between 1 and 6

col (in userInput method): column number entered out of range

Column number has to be between 1 and 6

contTurn (in userInput method): character entered invalid

Character entered has to be 'y' or 'n'

Member Function Documentation

```
def Logic.Logic.addTile ( board )
```

Method for adding tile(s)

in empty position(s). This method

uses checkColumn and

moveDown methods as well.

```
def Logic.Logic.adjacent ( row1,  
                           col1,  
                           row2,  
                           col2  
                           )
```

Method to check whether

the newly selected tile is adjacent or not to the currently selected one.

```
def Logic.Logic.checkColumn( columnNumber,  
                             board  
                             )
```

Method for checking empty spaces in a column.

```
def Logic.Logic.colourMatch( board,  
                             row,  
                             col,  
                             colour  
                             )
```

Method to check if the color of tiles is the same or not (when trying to match).

```
def Logic.Logic.moveDown( columnNumber,  
                          board,  
                          numEmpty  
                          )
```

Method for moving tiles down to empty positions in a given column.

```
def Logic.Logic.removeTile( board,  
                            row,
```

```
        col
    )
```

Method for removing
a tile (in the case where tiles of same
color are matched).

```
def Logic.Logic.userInput( board )
```

Method for all possible
inputs that user can give
to board. Two important
actions include deleting
tiles by entering row(s) and
column(s), and continuing
with/ending the game.

The documentation for this class was generated from the following file:

- [Logic.py](#)

Generated by 1.8.10

My Project

- [Main Page](#)
- [Packages](#)
- [Classes](#)
- [Files](#)

-

- [Class List](#)
- [Class Index](#)
- [Class Members](#)

- [Main](#)
- [Main](#)

[Static Public Attributes](#) | [List of all members](#)

Main.Main Class Reference

Static Public Attributes

[logic](#) = L.Logic

tuple [board](#) = L.B.Board()

Detailed Description

This class is the basis
for initializing the game
with a proper board and logic.

Input(s): None for this module.
Output(s): None for this module.

State variables: None for this module.
Environment variables: None for this module.

Exceptions: None for this module.

Member Data Documentation

tuple Main.Main.board = L.B.Board() static

Main.Main.logic = L.Logic static

The documentation for this class was generated from the following file:

- [Main.py](#)

Generated by 1.8.10

My Project

- [Main Page](#)
- [Packages](#)
- [Classes](#)
- [Files](#)

-

- [Class List](#)
- [Class Index](#)
- [Class Members](#)

- [Tile](#)
- [Tile](#)

[Public Member Functions](#) | [Public Attributes](#) | [List of all members](#)

Tile.Tile Class Reference

Public Member Functions

```
def \_\_init\_\_ (self)
```

```
def getColor (self)
```

Public Attributes

[color](#)

Detailed Description

Class for representing and creating tiles to populate the board with.

`__init__`: Input:

Function requires a parameter.

Output:

Function will initialize a tile of random color.

`getColor`: Input:

Function requires a parameter.

Output:

Function will return tile's color.

State variables:

`self` (for `__init__`): refers to newly created object

`self` (for `getColor`): refers to instance whose method was called

Environment variables: None for this module.

Exceptions: None for this module.

Constructor & Destructor Documentation

```
def Tile.Tile.__init__( self )
```

Constructor method for
setting a random color to a tile.

Member Function Documentation

```
def Tile.Tile.getColor( self )
```

Getter method for tile color.

Member Data Documentation

Tile.Tile.color

The documentation for this class was generated from the following file:

- [Tile.py](#)

Generated by 1.8.10