

CheckerBoard(int aDimension) – testCheckerBoardMinimumSize

<p>Input: aDimension = 8</p> <p>State: N/A</p>	<p>Output:</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>
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CheckerBoard(int aDimension) – testCheckerBoardMaximumSize\_16x16

<p>Input: aDimension = 16</p> <p>State: N/A</p>	<p>Output:</p> <p>State:</p> <p>[State of the board is unchanged. Just a 16x16 game board instead of 8x8.]</p>
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CheckerBoard(int aDimension) – testCheckerBoardInvalidSize

<p>Input: aDimension = 10</p> <p>State: N/A</p>	<p>Output:</p> <p>State:</p> <p>[State of the board is unchanged. Just a 10x10 game board instead of 8x8.]</p>
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whatsAtPos(BoardPosition pos) – testWhatsAtPos\_MaxRow\_MaxCol

<p>Input:</p> <p>pos = (7, 7)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output:</p> <p>'o'</p> <p>State:</p> <p>[State of the board is unchanged.]</p>
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whatsAtPos(BoardPosition pos) – testWhatsAtPos\_MaxRow\_MinCol

<p>Input:</p> <p>pos = (7, 0)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output:</p> <p>'*'</p> <p>State:</p> <p>[State of the board is unchanged.]</p>
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whatsAtPos(BoardPosition pos) – testWhatsAtPos\_MinRow\_MaxCol

<p>Input:</p> <p>pos = (0, 7)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output:</p> <p>'*'</p> <p>State:</p> <p>[State of the board is unchanged.]</p>
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whatsAtPos(BoardPosition pos) – testWhatsAtPos\_MinRow\_MinCol

<p>Input:</p> <p>pos = (0, 0)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output:</p> <p>'x'</p> <p>State:</p> <p>[State of the board is unchanged.]</p>
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whatsAtPos(BoardPosition pos) – whatsAtPos\_MiddleOfTheBoard

<p>Input: pos: (1, 6)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *     * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: '*'</p> <p>State: [State of the board is unchanged.]</p>
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placePiece(BoardPosition pos, char player) – testPlacePieceInMiddle

<p>Input: pos: (4, 0) char: 'x'</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: whatsAtPos(pos) == 'x'</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * * * x *   *  *  *  *    x *  *  *  *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>
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placePiece(BoardPosition pos, char player) – testPlacePiece\_OnPreviouslyOccupiedSpace

<p>Input:  pos = (2, 2)  char = 'x'  movePiece(pos, sw)  placePiece(pos, 'x')</p> <p>State:</p> <pre>  x  *  x  *  x  *  x  *    *  x  *  x  *  x  *  x    x  *  x  *  x  *  x  *    *    *    *    *        *    *    *    *    *  o  *  o  *  o  *  o    o  *  o  *  o  *  o  *    *  o  *  o  *  o  *  o   </pre>	<p>Output:  whatsAtPos(2,2) == 'x'</p> <p>State:</p> <pre>  x  *  x  *  x  *  x  *    *  x  *  x  *  x  *  x    x  *  x  *  x  *  x  *    *  x  *    *    *        *    *    *    *    *  o  *  o  *  o  *  o    o  *  o  *  o  *  o  *    *  o  *  o  *  o  *  o   </pre>
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placePiece(BoardPosition pos, char player) – testOccupiedSpot

<p>Input:  pos = (2, 3)  placePiece(pos, 'x')</p> <p>State:</p> <pre>  x  *  x  *  x  *  x  *    *  x  *  x  *  x  *  x    x  *    *  x  *  x  *    *    *    *    *        *    *    *    *    *  o  *  o  *  o  *  o    o  *  o  *  o  *  o  *    *  o  *  o  *  o  *  o   </pre>	<p>Output:  whatsAtPos(pos) == '*'</p> <p>State:  [State of the board is unchanged.]</p>
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placePiece(BoardPosition pos, char player) - testPlacePieceMinColumn

<p>Input: pos = (2, MinCol) char = 'o'</p> <p>State:</p> <pre>     *   *   *   *     *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *     *   *   *   *   </pre>	<p>Output: void</p> <p>State:</p> <pre>     *   *   *   *     *   *   *   *     o   *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *   </pre>
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placePiece(BoardPosition pos, char player) – testPlacePieceMinRow

<p>Input: pos = (MinRow, MinCol) char = 'o'</p> <p>State:</p> <pre>     *   *   *   *     *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *     *   *   *   *   </pre>	<p>Output: void</p> <p>State:</p> <pre>   o   *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *       *   *   *   *     *   *   *   *   </pre>
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placePiece(BoardPosition pos, char player) – testPlacePieceOnBlackSquare

<p>Input: pos = (2, 1) char = 'x'</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *   *   *   *       *   *   *     * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: void</p> <p>State: [State of the Board is unchanged.]</p>
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getPieceCounts(void) – testGetInitialPieceCounts

<p>Input: N/A</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *   *   *   *       *   *   *     * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: getPieceCounts(playerOne) == 12; getPieceCounts(playerTwo) == 12;</p> <p>State: [State of the board is unchanged.]</p>
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getViableDirections(void) – testGetInitialViableDirections

<p>Input: N/A</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: getViableDirections(playerTwo) == [NE,NW]</p> <p>State: [State of the board is unchanged.]</p>
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addViableDirections(char player, DirectionEnum dir) – testInitialDirectionAddition

<p>Input: player = 'x' dir = DirectionEnum.SE</p> <p>State: The viableDirections map is empty for player 'x' showing no directions have been assigned yet</p>	<p>Output: getViableDirections(playerOne) == [SE]</p> <p>State: The viableDirections map for player 'x' now contains SE, showing that SE has been added as a viableDirection for player 'x'</p>
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getRowNum(void) – testGetRowNumForBoard

<p>Input: N/A</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output:</p> <p>getRowNum = '8'</p> <p>State:</p> <p>[State of the board is unchanged.]</p>
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getColNum(void) – testColRowNumForBoard

<p>Input: N/A</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   *  *  *  *      *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output:</p> <p>getColNum = '8'</p> <p>State:</p> <p>[State of the board is unchanged.]</p>
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checkPlayerWin(Character player) – testCheckPlayerOneWins

<p>Input: player = 'x'</p> <p>State:</p> <pre>     *     *     *       *     *     *     *  x      *     *     *     *     *     *  x  *     *         *     *  x  *     *     *     *     *     *         *     *     *     *     *     *     *     *     </pre>	<p>Output: True</p> <p>State: [State of the board is unchanged.]</p>
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checkPlayerWin(Character player) – testCheckNoOneWins

<p>Input: player = 'x'</p> <p>State:</p> <pre>     *     *     *       *     *     *     *  x      *     *     *     *     *     *  x  *     *         *     *  x  *     *     *     *     *     *         *     *     *     *     *     *     *     *  o  </pre>	<p>Output: False</p> <p>State: [State of the board is unchanged.]</p>
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crownPiece(BoardPosition posOfPlayer) – testCrownLargeBoard

<p>Input: posOfPlayer = (15,14)</p> <p>State: A player one regular piece at position (15,14) on a 16x16 board.</p>	<p>Output: void</p> <p>State: Player one's 'x' becomes crowned, and switches to 'X', nothing else on the board changes.</p>
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crownPiece(BoardPosition posOfPlayer) – testCrownPlayerTwo

<p>Input: posOfPlayer = (1,1)</p> <p>State:</p> <pre>    * x * x * x *   * o * x * x * x   x *   * x * x *   *   *   *   *       *   *   *   *   *   * o * o * o   o * o * o * o *   * o * o * o * o  </pre>	<p>Output: void</p> <p>State:</p> <pre>  O * x * x * x *   *   * x * x * x   x *   * x * x *   *   *   *   *       *   *   *   *   *   * o * o * o   o * o * o * o *   * o * o * o * o  </pre>
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crownPiece(BoardPosition posOfPlayer) – testCrownAlreadyCrownedPiece

<p>Input: posOfPlayer = (6,2)</p> <p>State:</p> <pre>  x * x * x * x *   * x * x * x * x     *   * x * x *   *   *   *   *       *   *   *   *   *   * o * o * o   o * X * o * o *   * o *   * o * o  </pre>	<p>Output: void</p> <p>State:</p> <pre>  x * x * x * x *   * x * x * x * x     *   * x * x *   *   *   *   *       *   *   *   *   *   * o * o * o   o *   * o * o *   * o * X * o * o  </pre>
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crownPiece(BoardPosition posOfPlayer) – testCrownPieceMinRowMinCol

<p>Input: posOfPlayer = (MinRow, MinCol)</p> <p>State:</p> <pre>    * x * x * x *   * o * x * x * x   x *   * x * x *   *   *   *   *       *   *   *   *   *   * o * o * o   o * o * o * o *   * o * o * o * o  </pre>	<p>Output: void</p> <p>State:</p> <pre>  O * x * x * x *   *   * x * x * x   x *   * x * x *   *   *   *   *       *   *   *   *   *   * o * o * o   o * o * o * o *   * o * o * o * o  </pre>
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movePiece(BoardPosition startingPos, DirectionEnum dir) – testMoveToValidPos

<p>Input: startingPos = (2, 0) dir = (se)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *   x   *   x   *   x   *     *       *       *       *             *       *       *       *     *   o   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>	<p>Output: startingPosition(3,1)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x         *   x   *   x   *   x   *     *   x   *       *       *             *       *       *       *     *   o   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>
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movePiece(BoardPosition startingPos, DirectionEnum dir) – testMoveToOutOfBounds

<p>Input: startingPos = (2, 0) dir = (sw)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *   x   *   x   *   x   *     *       *       *       *             *       *       *       *     *   o   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>	<p>Output: startingPos(2, 0)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *   x   *   x   *   x   *     *       *       *       *             *       *       *       *     *   o   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>
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movePiece(BoardPosition startingPos, DirectionEnum dir) – testMoveToOccupiedSpace

<p>Input: startingPos = (6, 0) dir = (ne)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *   x   *   x   *   x   *     *       *       *       *             *       *       *       *     *   o   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>	<p>Output: startingPos(6, 0)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *   x   *   x   *   x   *     *       *       *       *             *       *       *       *     *   o   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>
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jumpPiece(BoardPosition startingPos, DirectionEnum dir) – testValidJump

<p>Input: startingPos = (3, 3) dir = DirectionEnum.SW</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *       *   x   *   x   *     *       *   x   *       *             *   o   *       *       *     *       *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>	<p>Output: BoardPosition (4, 4)</p> <p>State:</p> <pre>  x   *   x   *   x   *   x   *     *   x   *   x   *   x   *   x     x   *       *   x   *   x   *     *       *       *       *             *       *       *       *     *   x   *   o   *   o   *   o     o   *   o   *   o   *   o   *     *   o   *   o   *   o   *   o  </pre>
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jumpPiece(BoardPosition startingPos, DirectionEnum dir) – testJumpOwnPiece

<p>Input: startingPos = (2,4) dir = (sw)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x *   * x * x *   *   * x *   *       *   *   *   *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: startingPos(2,4)</p> <p>State: [State of the board is unchanged.]</p>
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jumpPiece(BoardPosition startingPos, DirectionEnum dir) – testJumpOffBoard

<p>Input: startingPos = (7, 7) dir = DirectionEnum.SE</p> <p>State:</p> <pre>   *   *   *   *   *   *   *   *       *   *   *   *   *   *   *   *       *   *   *   *   *   *   *   *       *   *   * x *   *   *   *   * o </pre>	<p>Output: startingPos(7, 7)</p> <p>State: [State of the board is unchanged.]</p>
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playerLostPieces(int numPieces, char player, HashMap pieceCounts) –  
testPlayerOneLosesPieces

<p>Input: numPieces = 3 char = 'x' pieceCounts: {'x': 0, 'o': 0}</p> <p>State: Player 'x' has all pieces</p>	<p>Output: void</p> <p>State: pieceCounts: {'x': 3, 'o': 0}</p>
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scanSurroundingPositions(BoardPosition startingPos) –  
testScanSurroundingPositionsAtMaxRow

<p>Input: startingPos = BoardPosition(7,3)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   * * * * * * *   * * * * * * *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: HashMap {   NE = 'o'   NW = 'o'   SE = EMPTY_POS   SW = EMPTY_POS }</p> <p>State: [State of the board is unchanged]</p>
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scanSurroundingPositions(BoardPosition startingPos) –  
testScanSurroundingPositionsFromCenter

<p>Input: startingPos: BoardPosition(4,4)</p> <p>State:</p> <pre> x * x * x * x *   * x * x * x * x   x * x * x * x *   * * * * * * *   * * * * * * *   * o * o * o * o   o * o * o * o *   * o * o * o * o </pre>	<p>Output: HashMap</p> <pre>{   NE = EMPTY_POS   NW = EMPTY_POS   SE = 'o'   SW = 'o' }</pre> <p>State:[State of the board is unchanged]</p>
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scanSurroundingPositions(BoardPosition startingPos) –  
testScanFromNewlyCrownedKingPositionAtMinRow

<p>Input: startingPos: BoardPosition(0,4)</p> <p>State: An "O" at (0,4) indicates a Player Two piece that has just been crowned as King.</p> <pre> x * x * O * x *   * x * * * x * x   x * * * x * x *   * * o * * * *   * o * o * * *   * o * * o * o   o * * o * o *   * o * o * o * </pre>	<p>Output: HashMap</p> <pre>{   NE = EMPTY_POS   NW = EMPTY_POS   SE = 'x'   SW = EMPTY_POS }</pre> <p>State:[State of the Board is unchanged]</p>
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scanSurroundingPositions(BoardPosition startingPos) – testScanFromMaxCol

<p>Input: startingPos = BoardPosition(3,7)</p> <p>State:</p> <pre>     0  1  2  3  4  5  6  7    0  x * x * x * x *    1  * x *   * x * x    2  x * o * o * x *    3  * x * o * x * o    4  x * o *   * o *    5  *   *   *   *    6  o *   * o *   *    7  * o * o * o * o  </pre>	<p>Output: HashMap</p> <pre> {   NE = EMPTY_POS   NW = 'x'   SE = EMPTY_POS   SW = 'o' } </pre> <p>State: [State of the Board is unchanged]</p>
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scanSurroundingPositions(BoardPosition startingPos) –  
test\_ScanSurroundingPositions\_AtMinCol.

<p>Input: startingPos = BoardPosition(2,0)</p> <p>State:</p> <pre>  x * x * x * x *   * x *   * x * x   x * o * o * x *   * x * o * x * o   x * o *   * o *   *   *   *   *   o *   * o *   *   * o * o * o * o  </pre>	<p>Output: HashMap</p> <pre> {   NE = EMPTY_POS   NW = EMPTY_POS   SE = 'x'   SW = EMPTY_POS } </pre> <p>State: [State of the Board is unchanged]</p>	
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getDirection(DirectionEnum dir) – testGetAllDirections

<p>Input:</p> <p>dir: DirectionEnum.NE dir: DirectionEnum.NW dir: DirectionEnum.SE dir: DirectionEnum.SW</p> <p>State: N/A</p>	<p>Output:</p> <p>BoardPosition(row: -1, col: 1) BoardPosition(row: -1, col: -1) BoardPosition(row: 1, col: 1) BoardPosition(row: 1, col: -1)</p> <p>State: N/A</p>
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What tests did each team member write? Just tell me the names of the functions (unless for some reason multiple team members wrote functions for the same method. In that case, tell me which tests specifically by giving me the test names)

<p>[member 1] Eli Boccolucci</p>	<p>checkerBoard(int aDimension) - all of them</p> <p>whatsAtPos(BoardPosition pos) - testPieceAtPos</p> <p>whatsAtPos(BoardPosition pos) - testNoPieceAtPos</p> <p>whatsAtPos(BoardPosition pos) – testWhenAPieceJumpsAnother</p> <p>placePiece(BoardPosition pos, char player)- testPlacePieceInMiddle</p> <p>placePiece(BoardPosition pos, char player) - testOccupiedSpot</p> <p>placePiece(BoardPosition pos, char player)- testPlacePieceOnBlackSquare</p> <p>checkPlayerWin(Character player) – testCheckPlayerOnewins</p> <p>getViableDirections(void)</p> <p>getRowNum(void)</p> <p>jumpPiece(BoardPosition startingPos, DirectionEnum dir) – testValidJump</p> <p>getDirection(DirectionEnum dir)</p>
<p>[member 2] Steven Spivack</p>	<p>placePiece(BoardPosition pos, char player) - testEdgeCaseRow</p> <p>placePiece(BoardPosition pos, char player) – testEdgeCaseColumn</p> <p>placePiece(BoardPosition pos, char player) – testPlacePiece_OnPreviouslyOccupiedSpace</p> <p>crownPiece(BoardPosition posOfPlayer)</p>

	<p>movePiece(BoardPosition startingPos, DirectionEnum dir)</p> <p>whatsAtPos(BoardPosition pos) – testInvalidPosRow</p> <p>whatsAtPos(BoardPosition pos - AfterAPieceMovesFromPos)</p> <p>whatsAtPos(BoardPosition pos - testWhatsAtPos_AfterJump)</p>
<p>[member 3] Luke Miller</p>	<p>placePiece(BoardPosition pos, char player) – testJumpOwnPiece</p> <p>playerLostPieces(int numPieces, char player, HashMap pieceCounts) – testPlayerOneLosesPieces</p> <p>checkPlayerWin(Character player) – testCheckNoOneWins</p> <p>getPieceCounts(void)</p>
<p>[member 4] Jonathan Flander</p>	<ul style="list-style-type: none"> <li>- scanSurroundingPositions(BoardPosition startingPos) - all of them</li> <li>- addViableDirections(char player, DirectionEnum dir)</li> <li>- placePiece(BoardPosition pos, char player)</li> <li>- jumpPiece(BoardPosition startingPos, DirectionEnum dir) – testJumpOwnPiece</li> <li>- getColNum(void)</li> </ul>