

The background is a light gray grid. Scattered across the grid are various geometric shapes: a small cluster of red, yellow, and blue squares in the top left; a yellow L-shaped piece in the top center; a red circle with a white center in the top right; a teal T-shaped piece in the top right; a large yellow semi-circle in the middle left; a blue and yellow staircase-like shape in the bottom left; a small teal and red piece in the bottom center; a blue and red piece in the bottom center; a blue I-shaped piece in the bottom right; and a vertical line of five red dots in the bottom right.

TETRIS

Software Systems 2024

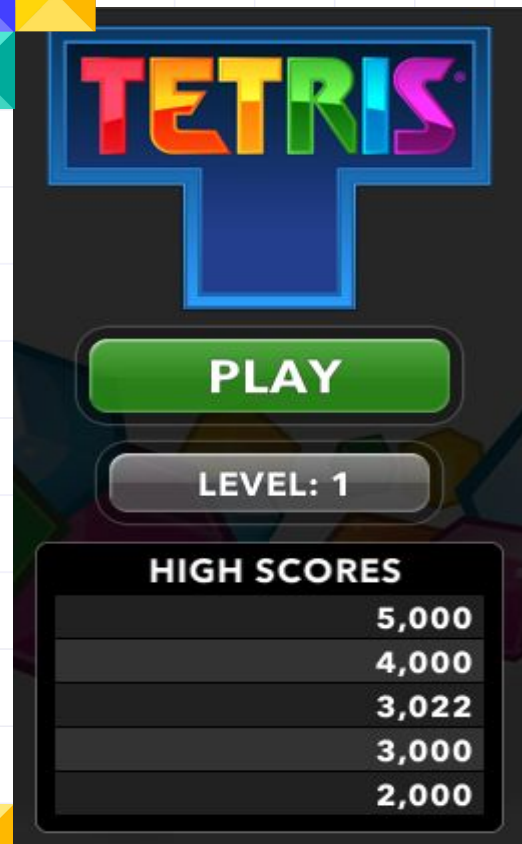
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PROJECT OVERVIEW

GOAL

Create an interactive software in C that allows user to play a game of tetris.

- Implement existing Tetris rules and scoring
- Clear visual representation





CONTENTS

01. IMPLEMENTATION


How did we do it?

02. DEMO

What does it look like?

03. RETROSPECTIVE

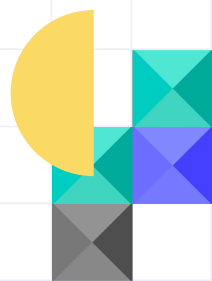

What did we learn?





HOW DO WE REPRESENT A PIECE?

```
typedef struct tetromino {  
    int rows;  
    int cols;  
    int shape[4][4];  
    SDL_Color color;  
    char letter;  
} tetromino;
```





MODEL

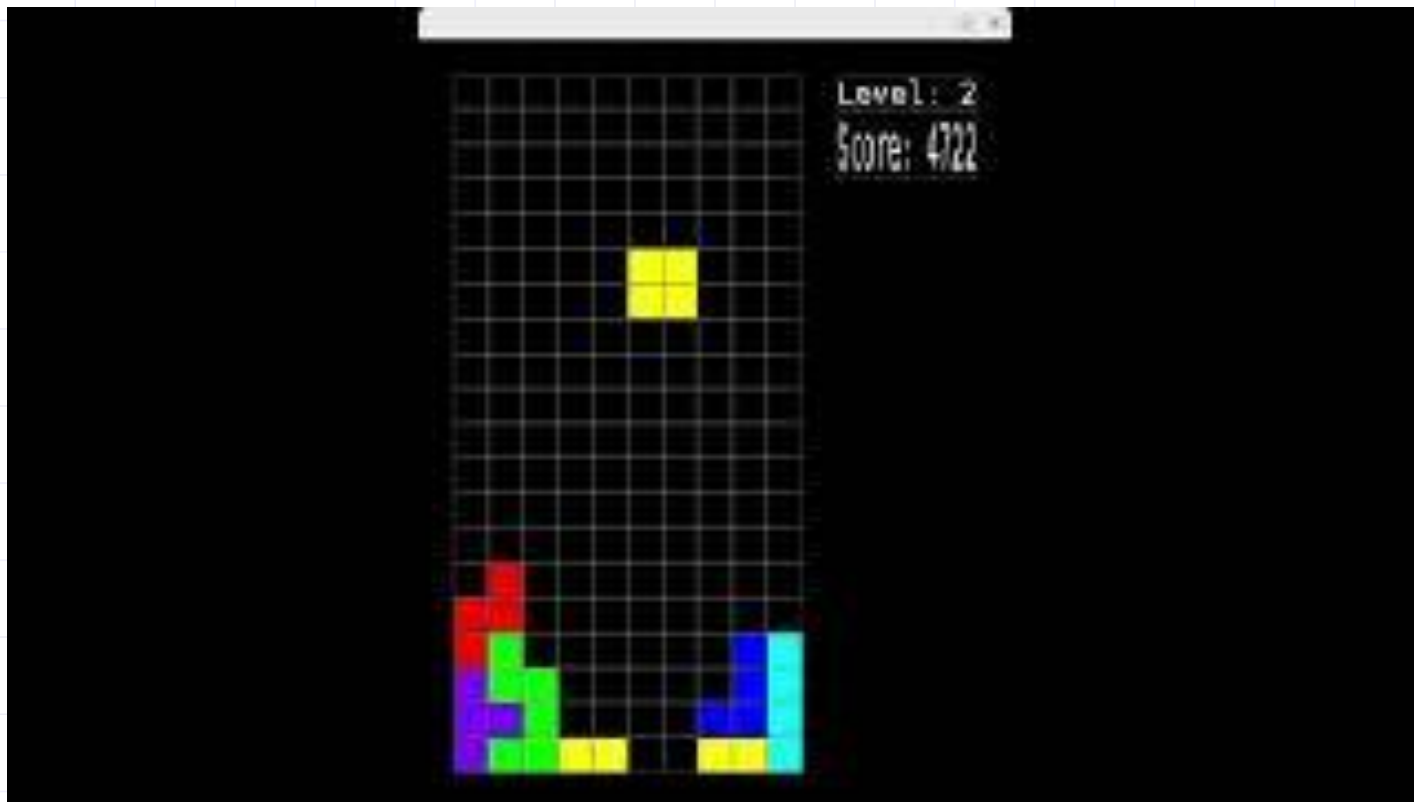
- Collision detection
- Line Clearing
- Scoring / Levels / Fall Speed
- Rotation

VIEW

- Rendering using SDL / SDL_ttf

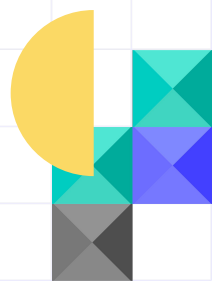
CONTROLLER

- User Input – key input, mouse clicks





RETROSPECTIVE

- Pick a model to follow before you start coding.
 - Start with a planned code architecture.
 - Deal with your Clang-Tidy Warning as they come.
 - Pick your language based on your project.
- 



THANK YOU