

Name: _____

Java Project

Choose a project appropriate for ____ hours of work inside class (____ classes) and outside class (____ hours). Suggestions are attached. The teacher is available for guidance.

PROPOSAL due _____

Write a paragraph explaining what you want to do. The teacher must approve the project.

PROJECT due _____

Demonstrate your finished project to the teacher and classmates.

Grading rubric

	Points
Quality of code	5
Quality of algorithm & logic	5
Design, Planning	5
Complexity	5
Difficulty	Extra credit
Originality	5
Correctness	5
Executability: does it run?	5
Code comments, documentation, instructions	5
Positive attitude	5
Independence	part of resourcefulness grade
Helpfulness to others	part of participation grade
Timeliness	5
Grade	
	out of 50 50 possible

Java Project ideas

To find ideas, google “Computer Programming Projects” “AP Computer Programming Projects” “Computer Science Programming Projects” “Java Programming Projects” “Computer Science Programming Projects”

Projects must incorporate topics from the previous chapters.

All students must use classes and objects (Chapters 8 and 9).

Students further along must also use a List, Set, Map, or recursion (Chapters 10–12).

- Games:
 - Battleship
 - Rush Hour
 - Tetris
 - Pacman
 - Sudoku (recursion. See textbook example, Chapter 12)
 - Checkers
 - Chess (no AI)

- Chapters 8–12 projects:
 - Chapter 8: Rational Numbers
 - Chapter 9: Critters
 - Chapter 10: Family Database
 - Chapter 11: Edit distance (or other project)
 - Chapter 12: Boggle (recursion)
 - Chapter 12: Towers of Hanoi (recursion)
 - Chapter 12: Anagrams (recursion)

- <http://projecteuler.net/>
 - Any project or projects of reasonable difficulty

- Simple calculator GUI
- Stop watch
- Game of life