



**College &  
Career for  
All Fund**

Established by Measure N



**OAKLAND UNIFIED  
SCHOOL DISTRICT**

*Community Schools, Thriving Students*

# Sojourner Truth

## 2024-2025 Measure Education Improvement Plan Presentation



Presented to Measures N and H Commission

April 16, 2024

[www.ousd.org](http://www.ousd.org)



@OUSDnews

# Overview of School

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- **Student Enrollment of School**
  - Total (High School) - 301
  - Female: 59.3%, Male: 39.8%, Non-binary: 1%
- **Highlights of Student Demographics (including LCAP and Focal Population)**
  - LCAP - ELL - 26.6%
    - 21.2% Arabic speaking
    - 19.2% Spanish speaking
  - Focal Population - African American - 31.3%
- **Schoolwide Systems Supporting Pathway Quality Improvement**
  - Regular Pathway Meetings
  - Teacher Professional Development
- **Other highlights:**
  - 100% virtual instruction via Zoom

# Our Pathway

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## Technology - Programming & Software Development Pathway

- **Knowledge & Skills Statements** ([PDF](#), [Excel](#))
- **Courses**
  - Computer Science Principles
  - Computer Science Programming
  - Senior Computer Science (Capstone)
- **Software Development Tools & Skills**
  - Students are using industry standard computer programming software systems including: python, java script, HTML, CSS among other integrated software
  - Students are creating projects centered in industry standard coding languages
  - Students utilize graphic design elements of computer programming
  - Students develop understanding of coding collaboration requirements
  - Students complete capstone by creating a fully functional game (Capstone)

# Reflections on 2023-24

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**Criterion 1: Measures N and H Pathway Improvement Progress Reflection: What has your reflection revealed about progress toward your strategic goals? What progress is evident in your school's reflection on Year 1 (2022-23) strategic actions?**

## Progress

- Established a structured Technology Pathway with a focus on programming and software
- Initiated integration of Technology Pathway into academic curriculum.
- Expanded work-based learning opportunities for students through partnerships with organizations like Pixar, facilitating internships and apprenticeships for hands-on experience.
- Detailed postsecondary transition planning provided by College and Career Readiness Specialist and East Bay Consortium (includes, college/scholarship applications, FAFSA, CTE program applications, etc.)
- Increased access to summer internship opportunities provided by Work Based Learning Liaison
- Prioritized equity and inclusion by ensuring all students, including historically underserved groups, have equitable access to Technology Pathway opportunities.

# Reflections on 2023-24

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**Criterion 2: Measures N and H Pathway Improvement Plan (Actions): What new or revised strategic actions will the school and pathways undertake in the coming year to continue to make progress toward three-year goals? How will these actions impact student achievement and experience to improve school-wide goals?**

## Strategic Action Highlights & Moving Forward

- Explore technology partnerships and micro-internships to provide work-based learning options and expand virtual opportunities.
  - Bridge gap between underserved students and tech industry
- Enhance project-based learning for engagement and personalized experiences
  - Students develop industry standard skills and collaboration requirements
- Review Pathway enrollment data and survey our students and families to address barriers and interests.
  - Promotes engagement and intrinsic motivation.
- Provide targeted outreach and support for underserved students
  - Mitigating barriers through exposure and interaction with technology.

# Reflections on 2023-24

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## Criterion 3: How will Measures N and H funds support strategic actions and progress toward goals?

- **Professional Development (PD) opportunities:** Funds teacher PD in areas such as Project-Based Learning (PBL), technology integration, and computer science principles to enhance curriculum and pathway development.
- **Technology infrastructure:** Invest funds in technology infrastructure, including hardware, software, and virtual learning platforms, to support initiatives like expanding virtual Work-Based Learning (WBL) opportunities and enhancing technology-focused curriculum.
- **Staffing Support:** Allocate funds to hire personnel dedicated to guiding students in dual enrollment programs, facilitating strategic actions such as dedicated pathway planning, and establishing partnerships with organizations offering virtual internship opportunities and other Work-Based Learning (WBL) experiences.

\*These investments aim to expand opportunities for students, enrich their educational experience, and ensure academic success and support.

# Achievement Summary for 1 class - CodeCombat

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## Summary

Using CodeCombat's personalized learning engine...

 **25** students

wrote...

 **2,638** computer programs


across an estimated...

 **17K** lines of code

in...

 **97** coding hours


and expressed creativity by building

 **35** standalone game and web projects

# Capstones - Create a Computer Game

GRAVITY: Capstone Project for Chapter 1 only available

Example Project Project Name



Time to build your game to trap the Darkness!

**Learning Goals**

- ✓ Create an interactive game to demonstrate mastery of algorithms, debugging, objects, methods, and loops.

**Concepts covered**

- ✓ Problem Solving
- ✓ Sequences & Algorithms
- ✓ For Loops
- ✓ Debugging
- ✓ Syntax
- ✓ Objects
- ✓ Methods
- ✓ Game Design

complete In Progress Assigned

<input checked="" type="checkbox"/> Aisha Ali (Student)	<a href="#">View Project</a>
<input checked="" type="checkbox"/> De'angelo T	<a href="#">View Project</a>
<input type="checkbox"/> Fynnnton D	<a href="#">View Project</a>
<input checked="" type="checkbox"/> Geovani Morris (Student)	<a href="#">View Project</a>
<input type="checkbox"/> Graciela Amar (Student)	<a href="#">View Project</a>
<input type="checkbox"/> Isaac Yanoupeith (Student)	<a href="#">View Project</a>
<input checked="" type="checkbox"/> Jessica G	<a href="#">View Project</a>
<input type="checkbox"/> Kevin Eason (Student)	<a href="#">View Project</a>
<input checked="" type="checkbox"/> Lauren Grier (Student)	<a href="#">View Project</a>
<input checked="" type="checkbox"/> Lereko Tshosane (Student)	<a href="#">View Project</a>
<input checked="" type="checkbox"/> Lucy Dinh (Student)	<a href="#">View Project</a>
<input checked="" type="checkbox"/> Oren Frieson (Student)	<a href="#">View Project</a>



# Student Chapter Capstone - CodeCombat



Use variables and conditionals to build an interactive story with characters and dialogue.

## Learning Goals

- ✓ Use variables and conditionals to make a story.

## Concepts covered

- ✓ Sequences & Algorithms
- ✓ Syntax
- ✓ Debugging
- ✓ Variables
- ✓ Boolean Logic
- ✓ Conditionals

complete in progress assigned

- Aisha Ali (Student) [View Project](#)
- De'angelo T. [View Project](#)

**Game Goals**

- ✓ Create first character using a variable.
- ✓ Create second character using a variable.
- ✓ Set background.
- ✓ Have your characters ENTER the screen.
- ✓ Have each character SAY at least one thing.
- ✓ Assign .showChoice to a variable.
- ✓ Use if statements to branch your dialog.

**Student Code**

```
• Create your story
game.setBackground("forest")
game.createCharacter("fox")
fox = game.createCharacter("fox")
fox.say("hello")
fox.enter("left")
fox.say("hello")
game.createCharacter("dragon")
dragon = game.createCharacter("dragon")
dragon.enter("right")
dragon.say("hello")
choice = game.showChoice("fox appears", "dragon appears.")
if choice == 1:
    character = game.createCharacter("fox")
if choice == 2:
    character = game.createCharacter("dragon")
character.enter("left")
character.say("hello")
```

- Fynnton D. [View Project](#)
- Geovani Morris (Student) [View Project](#)

# Student Chapter Final Capstone - CodeCombat

Sandro Jones (Student) View Project

### Game Goals

- ✓ Create at least 3 different objects.
- ✓ Set up player controls with setControl.
- ✓ Add directions for your game.
- ✓ Update the game.
- ✓ Play the game
- ✓ Use the hit method to check if two of your objects have hit each other.
- ✓ Use setDisplay to display information to the player.
- ✓ Define a function.
- ✓ Use game.end to set up a lose condition.
- ✓ Use game.win to set up a win condition.
- ✓ Win your game.

### Student Code

```
# GAME SET UP
# Spawn your avatar and set the control here.
# I got the chase game idea from vega's code.
avatar = game.spawnObject("ghost",4,5)
avatar.setControl("wasd")
avatar.setSpeed(1.5)

# Spawn any additional objects you'll need for your game.
jewel1 = game.spawnObject("jewel-blue", "random", "random")
jewel2 = game.spawnObject("jewel-blue", "random", "random")
jewel3 = game.spawnObject("jewel-blue", "random", "random")

enemy = game.spawnObject("seeker", "center", "top")

# write the directions for your game
game.addTextDirections("Use WASD keys to help the ghost eat the jewels before the enemy does!")

# Set up any object interactions here such as chasing or escaping.
enemy.setChaseTarget("jewel-blue")
enemy.setSpeed(1)

# Set up any variables you'll need for your game such as "points" or "lives".
points = 0

# use "setDisplay" to display information to the player.
game.setDisplay("TIME", 0)
game.setDisplay("SCORE", points)

# Define any functions here for code that you may want to reuse.
def moveJewel(jewel):
    jewel.setx("random")
    jewel.sety("random")

# GAME LOOP
# The while loop repeats rounds of the game until 45 seconds have passed.
while game.timePassed() < 45:
    game.advanceGame() # do not remove this method or it will break the game!
    # update your displays here
    game.setDisplay("TIME", game.timePassed())
    game.setDisplay("SCORE", points)
    # use conditionals to check whether objects have hit each other.
    # I got the idea of looking for a type of object from capella's code.
    if avatar.hit("jewel-blue"):
        points += 1
        moveJewel(avatar.hitObject("jewel-blue"))
```



# Student Certs and Completed Games - Tynker



**Lucy Dinh (Student)**  
Computer Programming 2 Per 2  
**Grade: 6-8**  
Tynkering since Aug 06, 2023  
Logged in: Jan 11, 2024

Print Report    Send to Guardian

Lines of Code Written



1 Line of Code

Lessons Completed



6 Lessons

Concepts Mastered



11 Concepts

Projects Created



1 Project

## Certificates Earned



## Projects Created



**Target Practice**  
By Lucy

SHOWCASE



**Create a Moving Target**  
By Lucy

SHOWCASE



**Creating Targets**  
By Lucy



# Examples of Student Block Code - Tynker

The screenshot displays the Tynker code editor interface. On the left, the 'Instructions' panel shows 'Step 1 of 3' with the task 'Add hover animation'. The main workspace is titled 'Code for Hero' and contains several scripts:

- Controller:** A script that manages the character's state based on a 'jump' variable. It includes conditional blocks for 'jump = 1', 'jump = 2', 'jump = 3', and 'jump = 4', each triggering an animation (Jump, Flip, Hover) and setting the next jump state. It also includes a 'run' variable to switch between 'Run' and 'Idle' animations.
- Code for Hero:** A script that handles the character's movement and physics. It starts with a 'when up arrow pressed' event, which sets 'jump' to 1, waits 0.25 seconds, and sets linear velocity to x: x linear velocity, y: 0. It then applies an impulse of 70 at 0 degrees. This sequence repeats for 'jump = 2' and 'jump = 3'. A 'when y position < -500 occurs' event triggers a 'broadcast game over' message, a 1-second wait, and a 'stop all' command. The script also includes a 'setup' block to show the character, set it to active, and set its shape to rectangular.
- when actor collides:** A script that resets the 'jump' variable to 0 when the character collides with an object.
- on start:** A script that sets up the character's initial state, including a 'Controller' block.

On the right side of the editor, the 'Code View' shows a preview of the character in a space-themed environment. Below the preview is an 'Add Actor' panel with a list of assets including 'Stage', 'Hero', and several 'png' files.

# Student Certs and Completed Games - Tynker

Rafaa's Assignments for Computer Programming 2 Period 2

▶ NEXT ASSIGNMENT: 1.4.9 Perimeter Check

Search:

### Karel Adventures 1

Unit 1: Mix and Match Middle School Course

5 LESSONS

92% COMPLETED

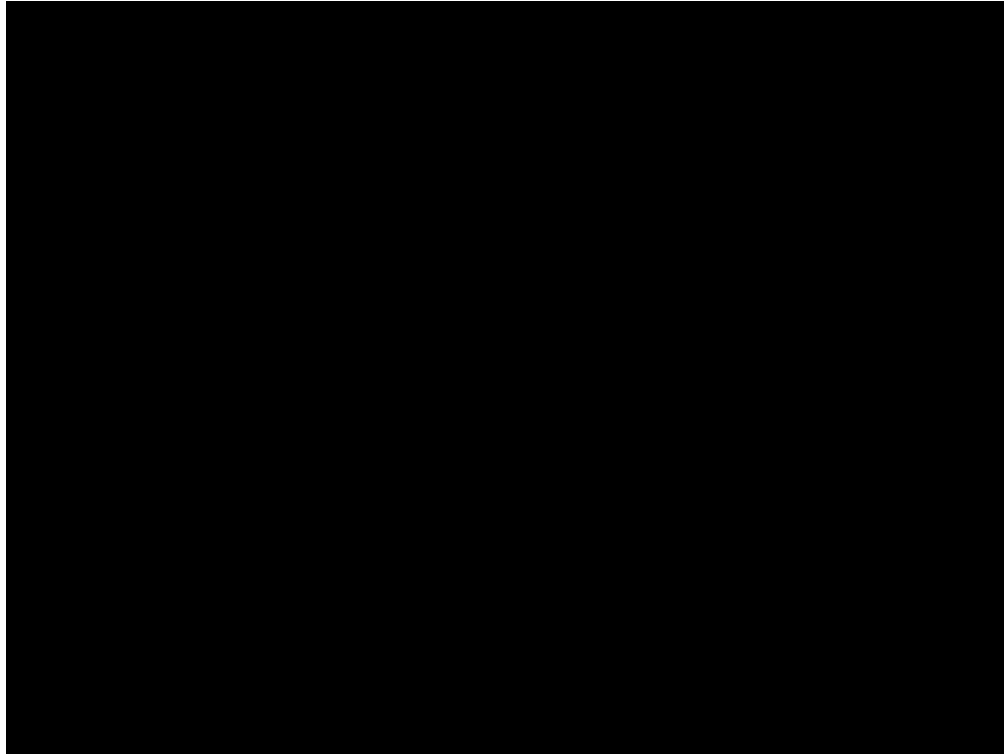
View Lessons

- 1.1 Karel's Coding Environment
- 1.2 Karel Error Messages
- 1.3 The Rabbit Chase
- 1.4 Lost in Space
- 1.5 Karel Adventures 1: Evaluation

Resume

# Industry Standard - Coding Platforms Used

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# Questions?

# EVERY STUDENT THRIVES!



End slide with changeable photo.  
Please adjust opaque box as **best fits the photo**. This example above shows 35% white. Delete this orange box and text box!



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