



# RoboThink

## CODING PROGRAM

AGES 12–15



Tom & Jerry



Magic Wand



Dive into Dragonfly



Flappy Bird



Galactic Clones



Soccer Play

### BUILD FUN VIDEO GAMES BY LEARNING:

- Coding Logic & Problem-Solving
- Game Design & Animation
- Variables, Loops & Conditionals

## **RoboThink Coding Program (Ages 12–15)**

Our Coding Program is a hands-on, project-based learning experience designed to help students build real programming skills while creating fun and interactive games. Each week, students develop a brand-new coding project, with lessons increasing in complexity as they progress. Through guided instruction and creative challenges, students strengthen logical thinking, problem-solving skills, and confidence in technology. **Laptop required for participation in this class.**

### **6 Week Curriculum**

#### **Tom & Jerry**

Students design a chase-style game while learning character movement, collision detection, and event-based programming.

#### **Magic Wand**

An interactive effects project where students explore conditionals, triggers, and creative animations.

#### **Dive into Dragonfly**

A flight-control game that introduces gravity, motion mechanics, and precision timing.

#### **Flappy Bird**

Students recreate a popular arcade-style game while learning variables, scoring systems, and difficulty scaling.

#### **Galactic Clones**

A space-themed project focused on cloning, multi-character interaction, and advanced game logic.

#### **Soccer Play**

A sports simulation where students program movement, goals, scoring, and multiplayer-style interactions.

**What Students Will Learn:** Coding fundamentals and logical thinking • Game design and interactive storytelling • Variables, loops, and conditionals • Debugging and problem-solving skills • Confidence in building independent projects