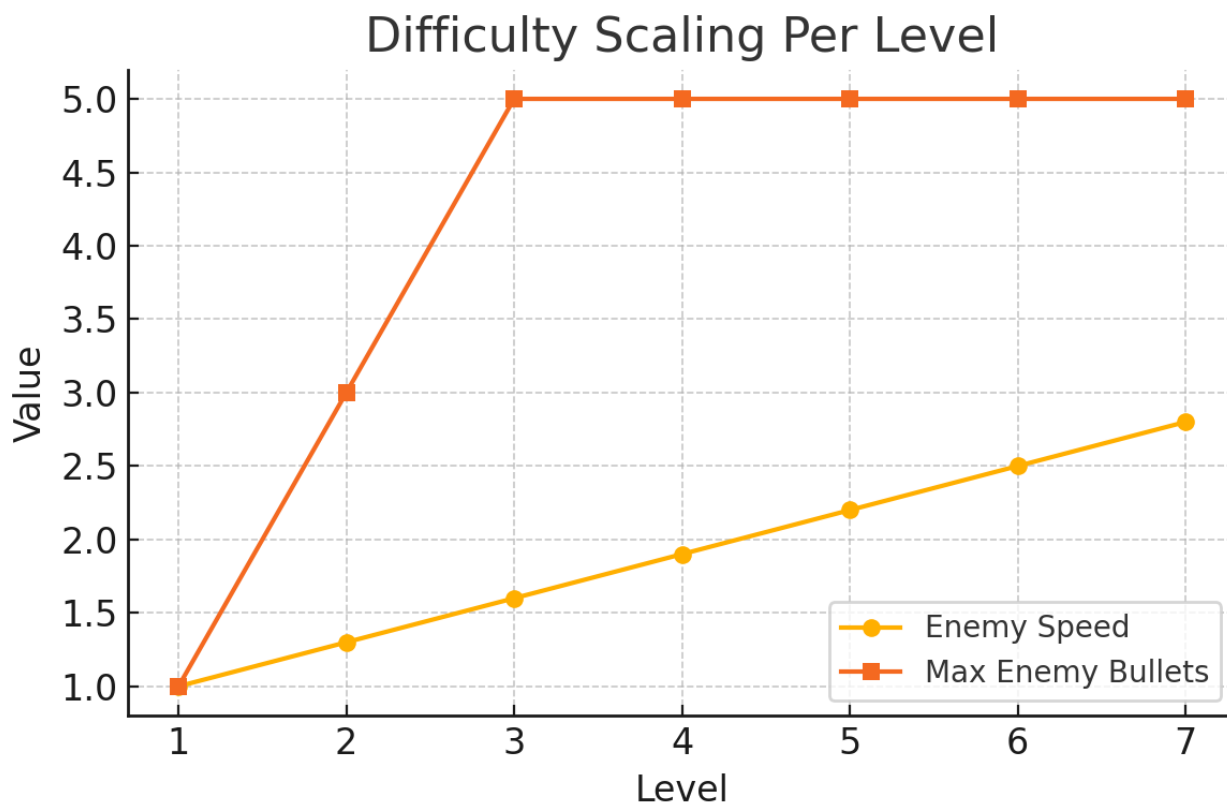# Level Progression Design: Stat Changes & Enemy Movement

Overview

This design document outlines how the game's difficulty increases across levels through stat scaling and enhanced enemy behavior, including new movement styles and attack patterns.

Difficulty Scaling Chart

The chart above demonstrates how enemy speed and missile count increase with level progression.

Level-by-Level Behavior Summary

Level 1:

- Enemy ships only shoot 1 missile at a time.

- Enemy ships move horizontally in a back-and-forth pattern.

Level 2:

- Enemy ships now enter row-by-row, as grouped formations.

- Maximum of 3 enemy missiles can be present on screen simultaneously.

Level 3:

- A new type of enemy appears from the top, attacking in a sine wave motion.

- This new ship type cannot shoot missiles.

- There is a 3-second pause between wave completion and the next dive from this new ship type.

- Maximum of 5 enemy missiles can be active at once.

Update Logic Placement

Diving behavior and movement enhancements are added after the wave-cleared check in the game loop to ensure correct targeting of new enemies and avoid logic conflicts with outdated enemy data.