

FOR UNIT 1 METHODS

DINGYI TANG / ALEX

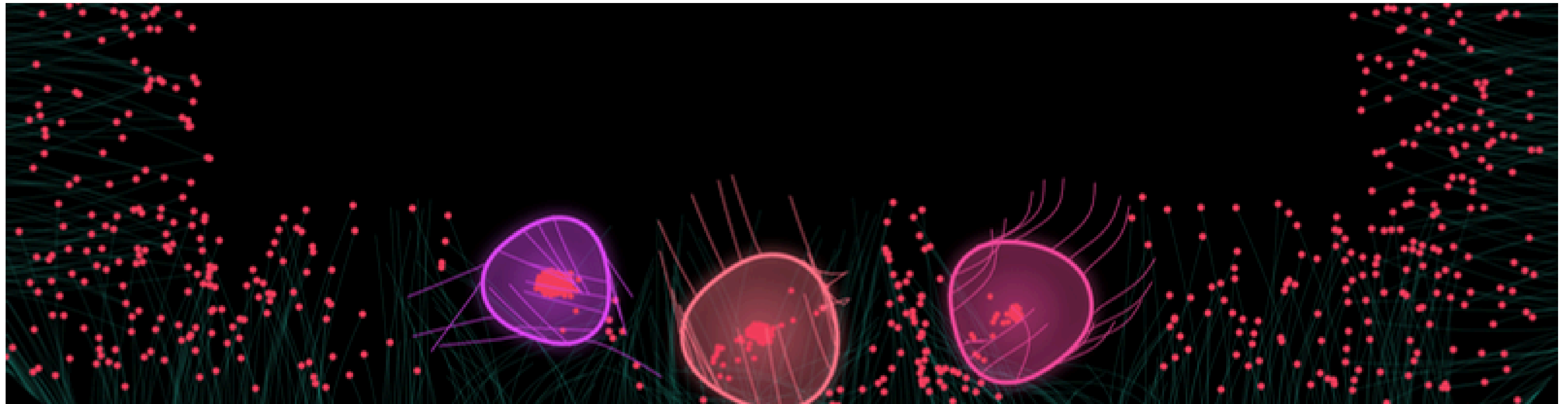
METHODS OF ITERATING

HACKING WEEK

WEEK 3

CELLS - BASELINE

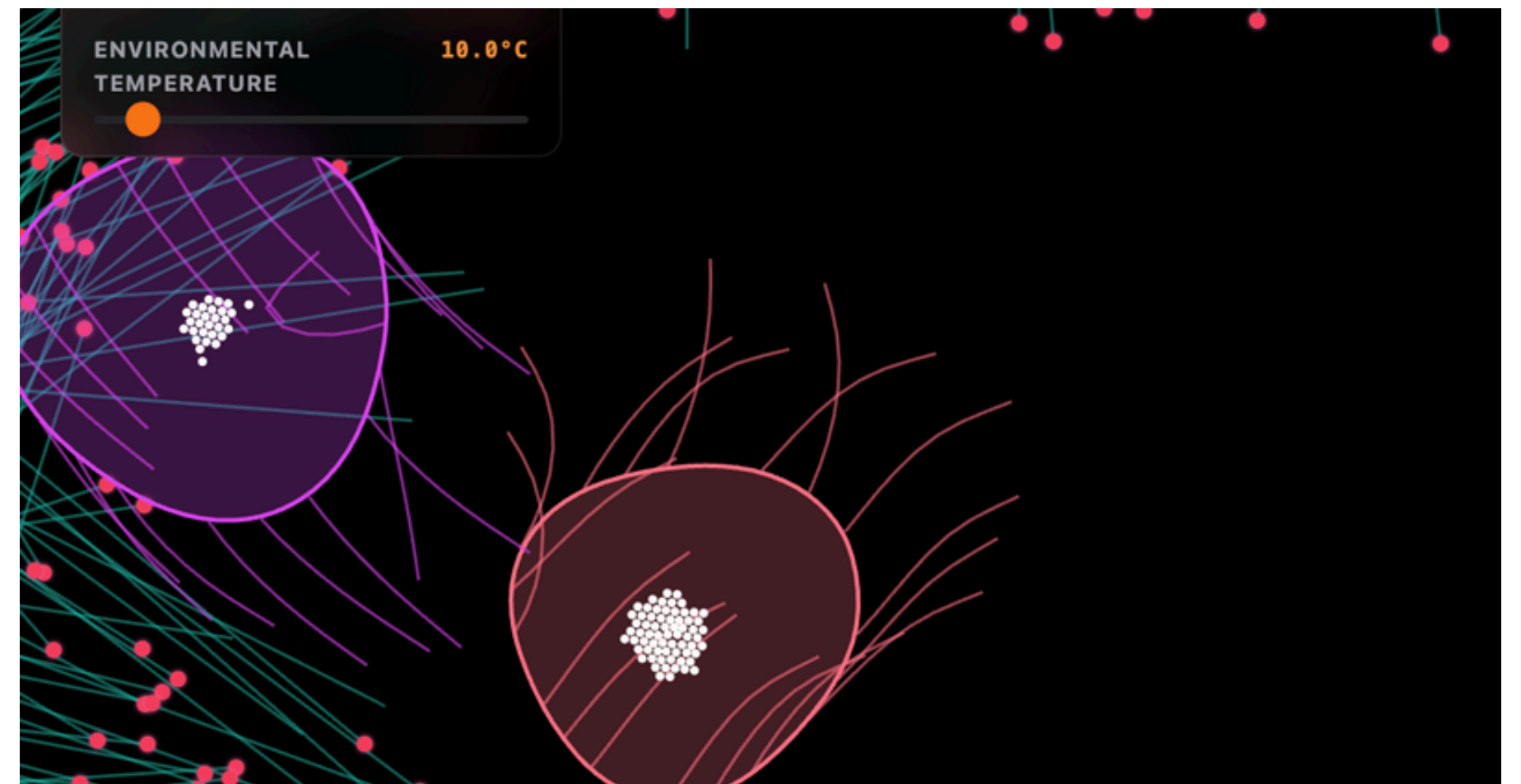
I created a highly rational ecological model:
three cells with a singular objective—feeding.
It just shows my vision of a simulated 'life system'.



CELLS - HACK 1

I added an environmental temperature variable to the control panel to simulate a laboratory setting. When lowered, cellular activity slows until it ceases. When raised, cells grow increasingly agitated until they ultimately perish from the heat.

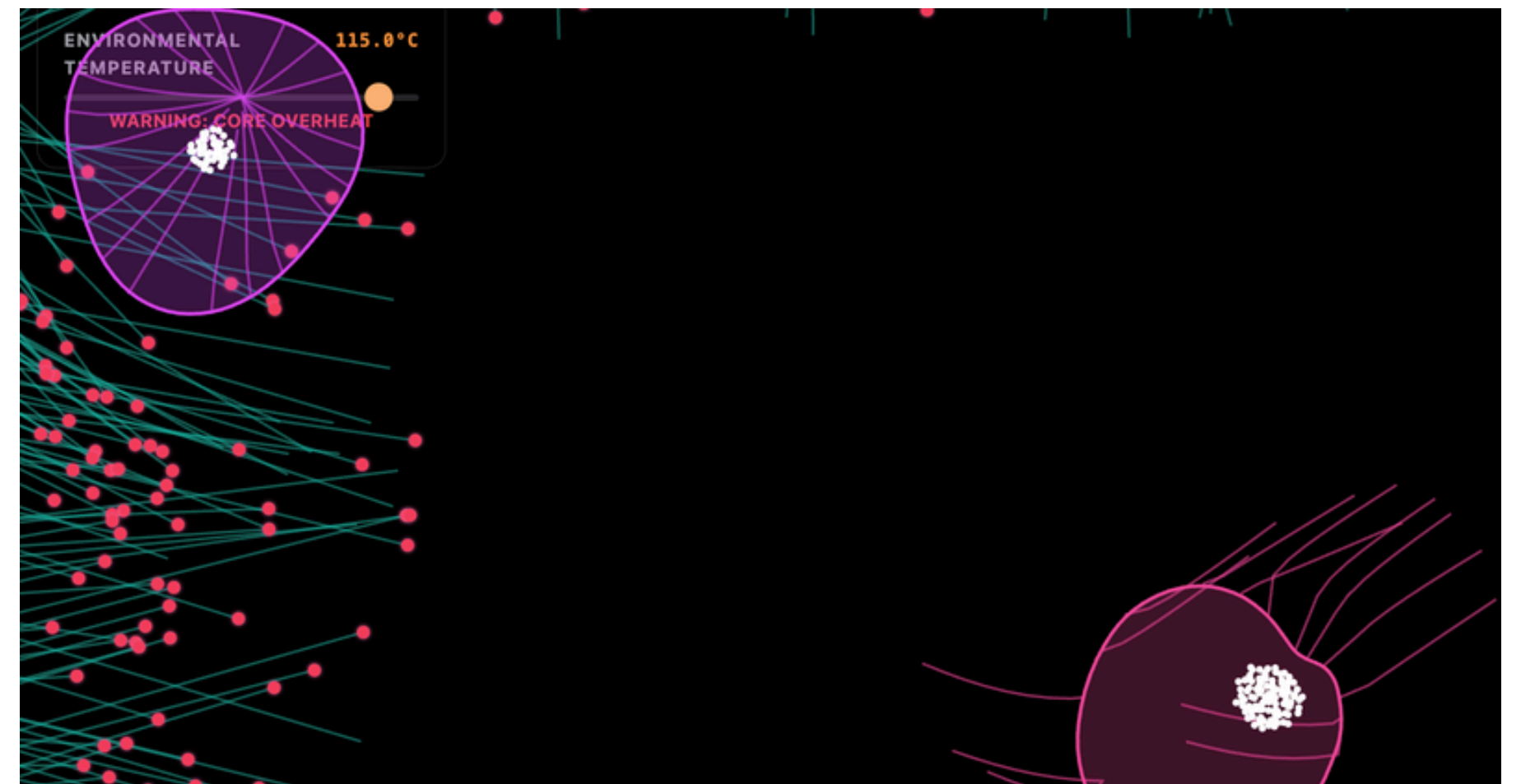
ENVIRONMENT VARIABLE



CELLS - HACK 2

I attempted to have the cells interact with my control panel. When the environmental temperature exceeds 100 degrees, they leap onto the control panel and push the temperature control lever downward.

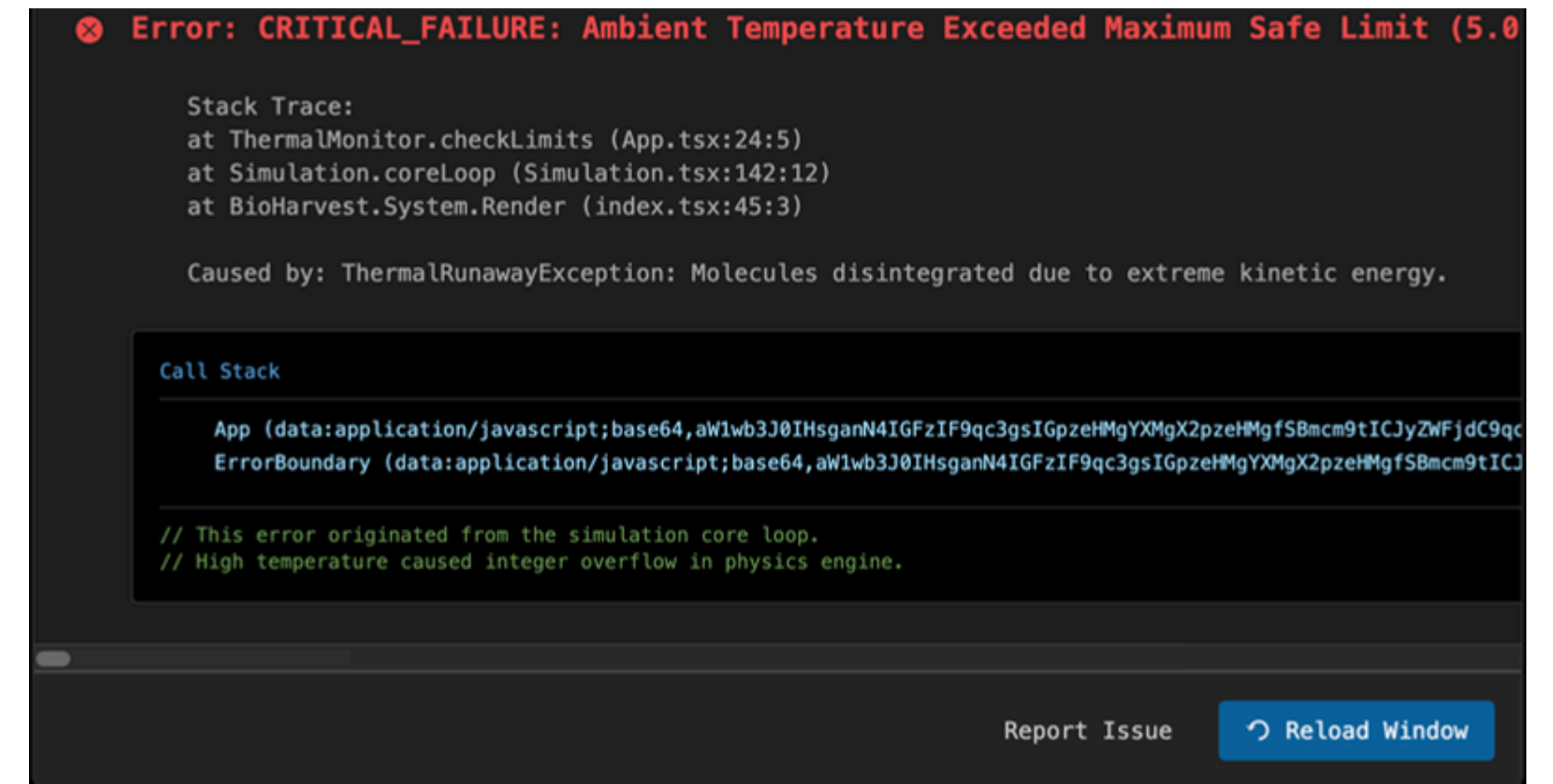
AGENCY



CELLS - HACK 3

I attempted to have the cells interact with my control panel. When the environmental temperature exceeds 100 degrees, they leap onto the control panel and push the temperature control lever downward.

SIMULATION ERROR



```
⊗ Error: CRITICAL_FAILURE: Ambient Temperature Exceeded Maximum Safe Limit (5.0)

Stack Trace:
at ThermalMonitor.checkLimits (App.tsx:24:5)
at Simulation.coreLoop (Simulation.tsx:142:12)
at BioHarvest.System.Render (index.tsx:45:3)

Caused by: ThermalRunawayException: Molecules disintegrated due to extreme kinetic energy.

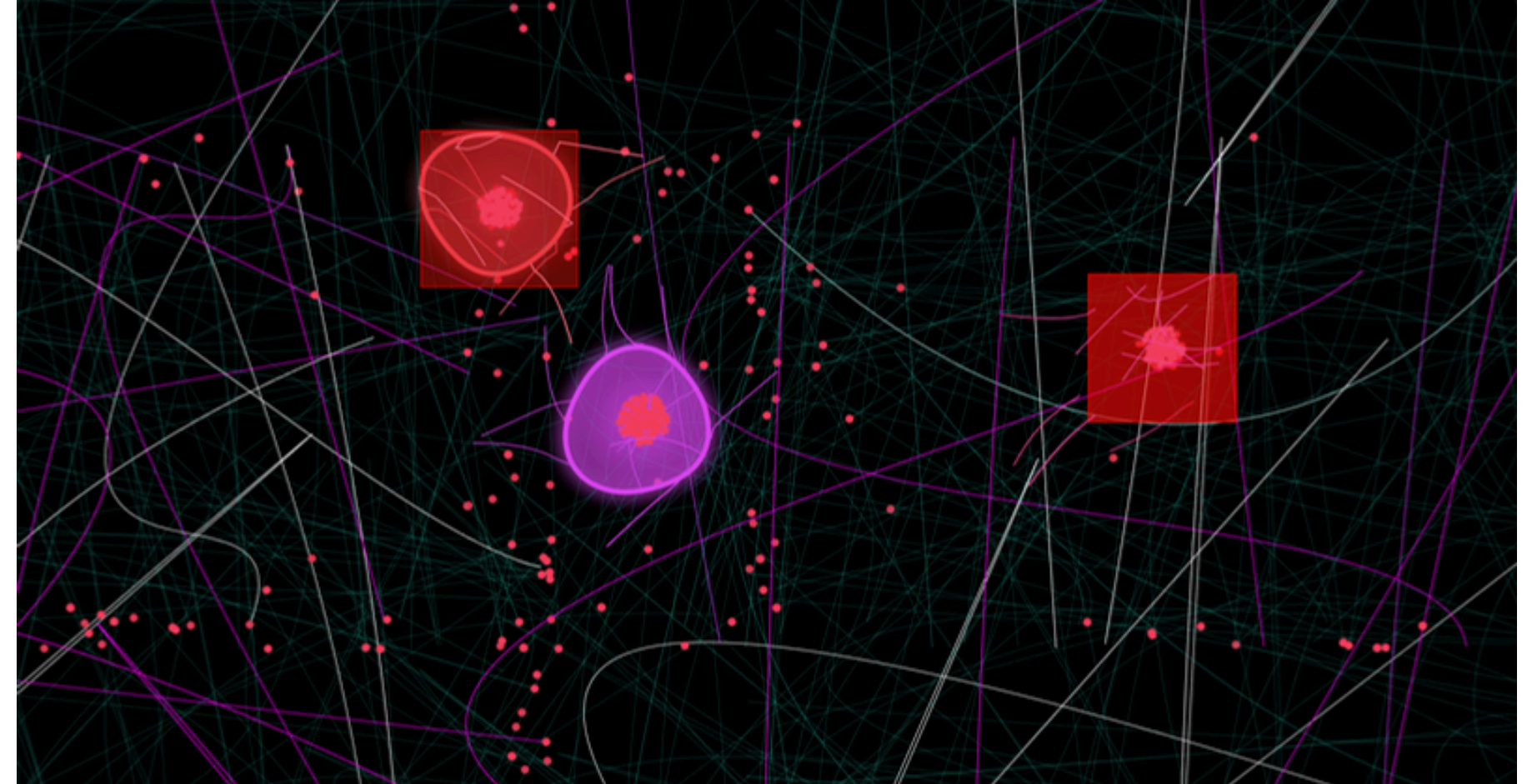
Call Stack
App (data:application/javascript;base64,aW1wb3J0IHsganN4IGFzIF9qc3gsIGpzeHMgYXMgX2pzeHMgfSBmcm9tICJyZWJjdc9qc
ErrorBoundary (data:application/javascript;base64,aW1wb3J0IHsganN4IGFzIF9qc3gsIGpzeHMgYXMgX2pzeHMgfSBmcm9tICJ
// This error originated from the simulation core loop.
// High temperature caused integer overflow in physics engine.
```

Report Issue [↻ Reload Window](#)

CELLS - HACK 4

My main intention was to intervene in the simulation by altering its code. When adjusting the temperature module, I allowed environmental pressure to disrupt the control rules of object parameters, specifically gravity. As a result, the entire environment fell into a state of disorder.

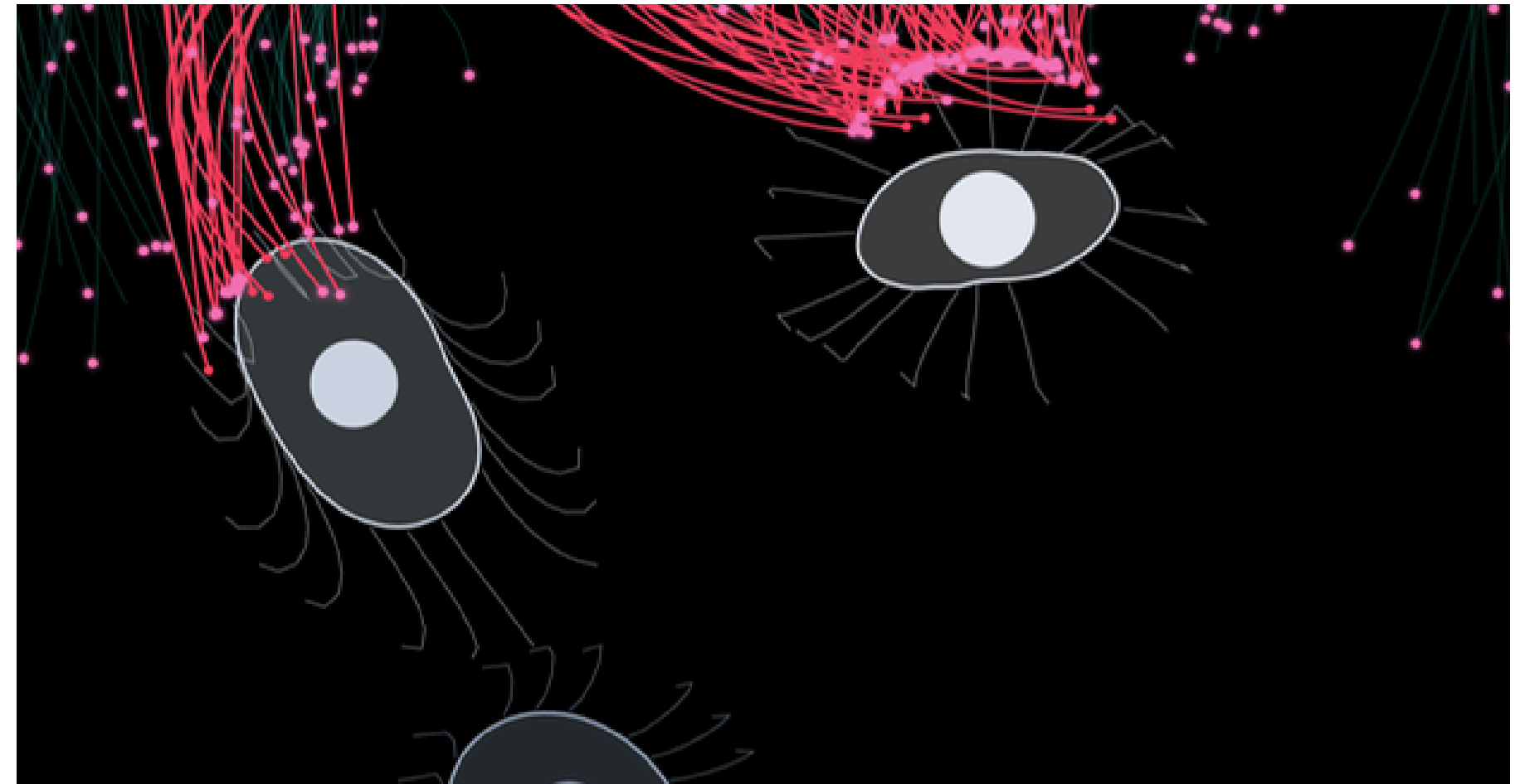
CODE DELETE



CELLS - HACK 5

Here, I experimented with changing the rules of the system. My main intention was to shift the relationship between subject and object. Instead of the cells capturing food, the environment itself became a predator that captures the cells.

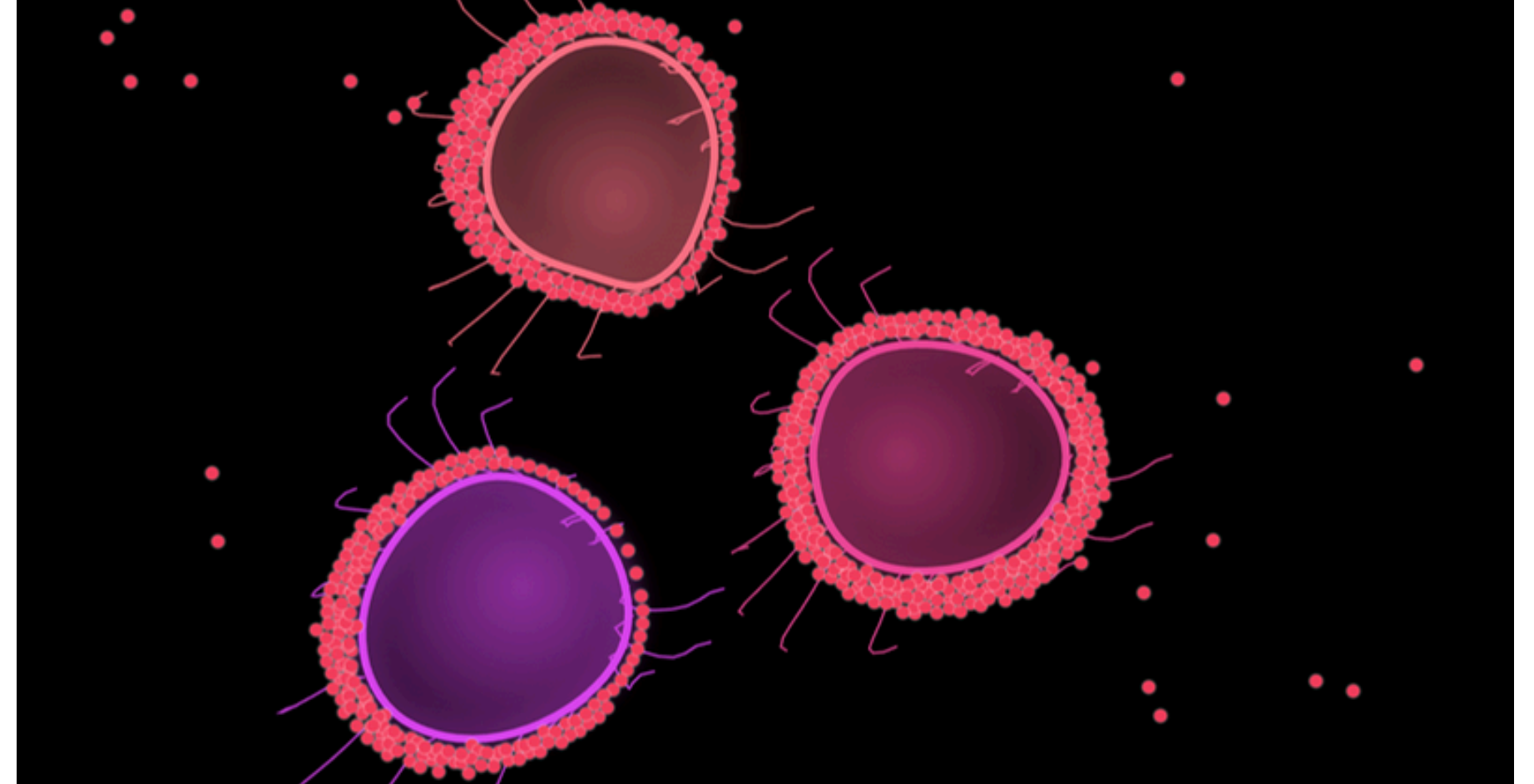
SWITCHING ROLES 1



CELLS - HACK 6

Here, I experimented with changing another rule. My original intention was to constrain the red food through the environment and its rules. However, in this case, it followed a different approach. The cells began to control the red particles through gravity, behaving like planets.

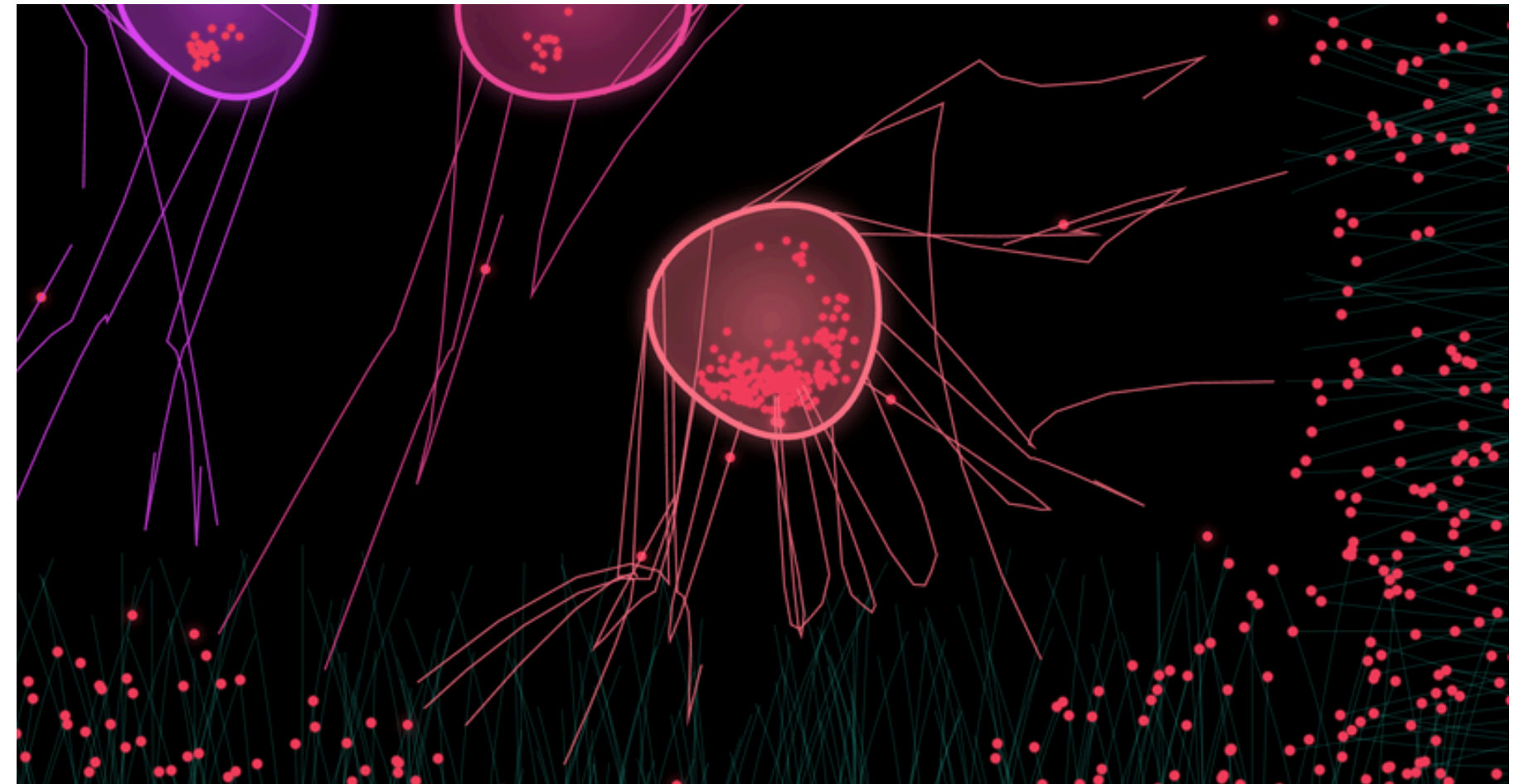
SWITCHING ROLES 2



CELLS - HACK 7

AI always solves problems from the most unexpected angles, like taking the wrong path but arriving at the right destination. For instance, I designed a panel to control a cell's feeding speed. But when I increased its size, the cell didn't move faster as expected. Instead, it altered the length of its tentacles to consume more food rapidly within a short time.

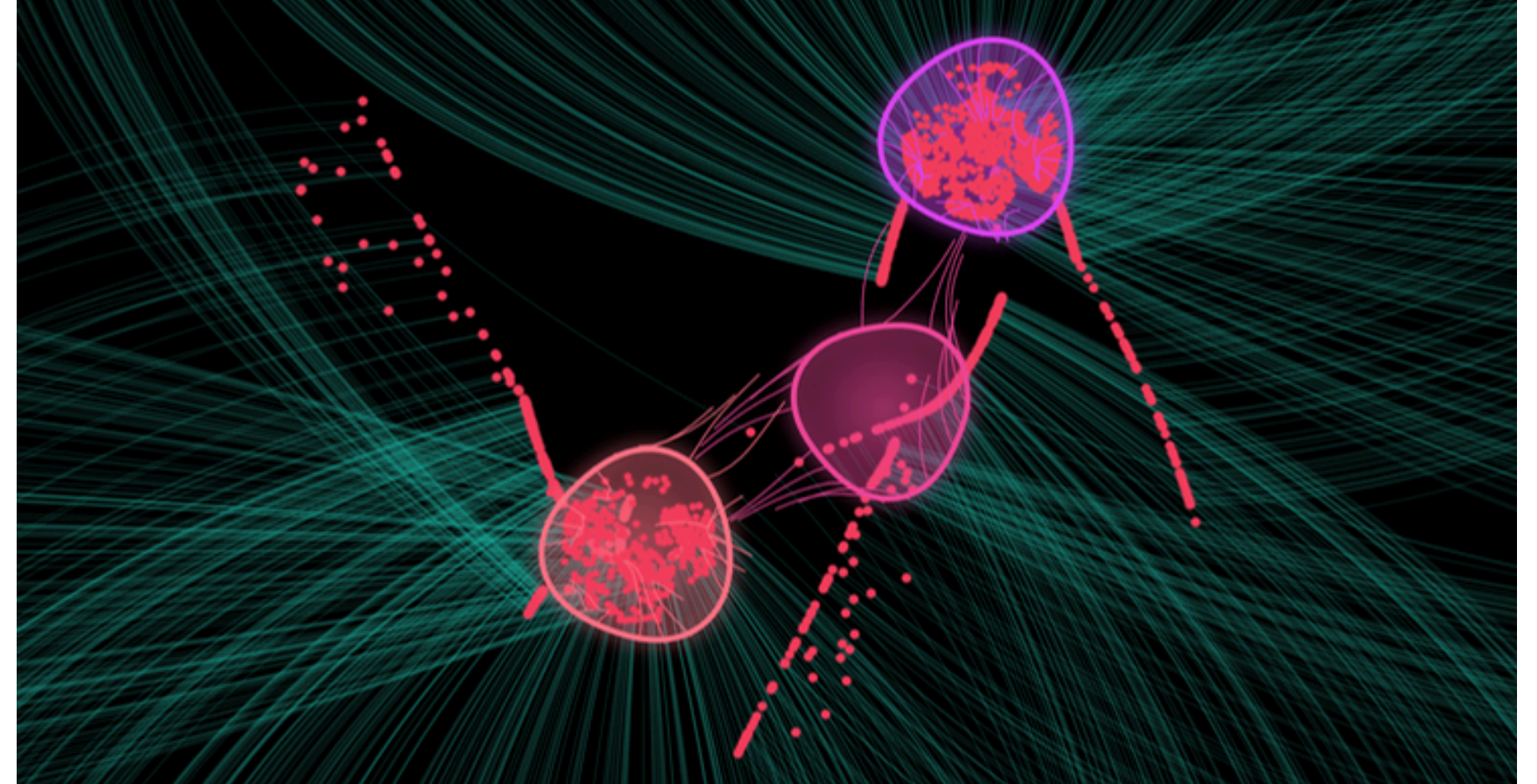
WRONG SUBJECTION / RESIST 1



CELLS - HACK 8

This is another special way to control a cell's feeding speed. When I increased its size, the cell didn't move faster as expected. Instead, it altered the length of grass to provide the food easily.

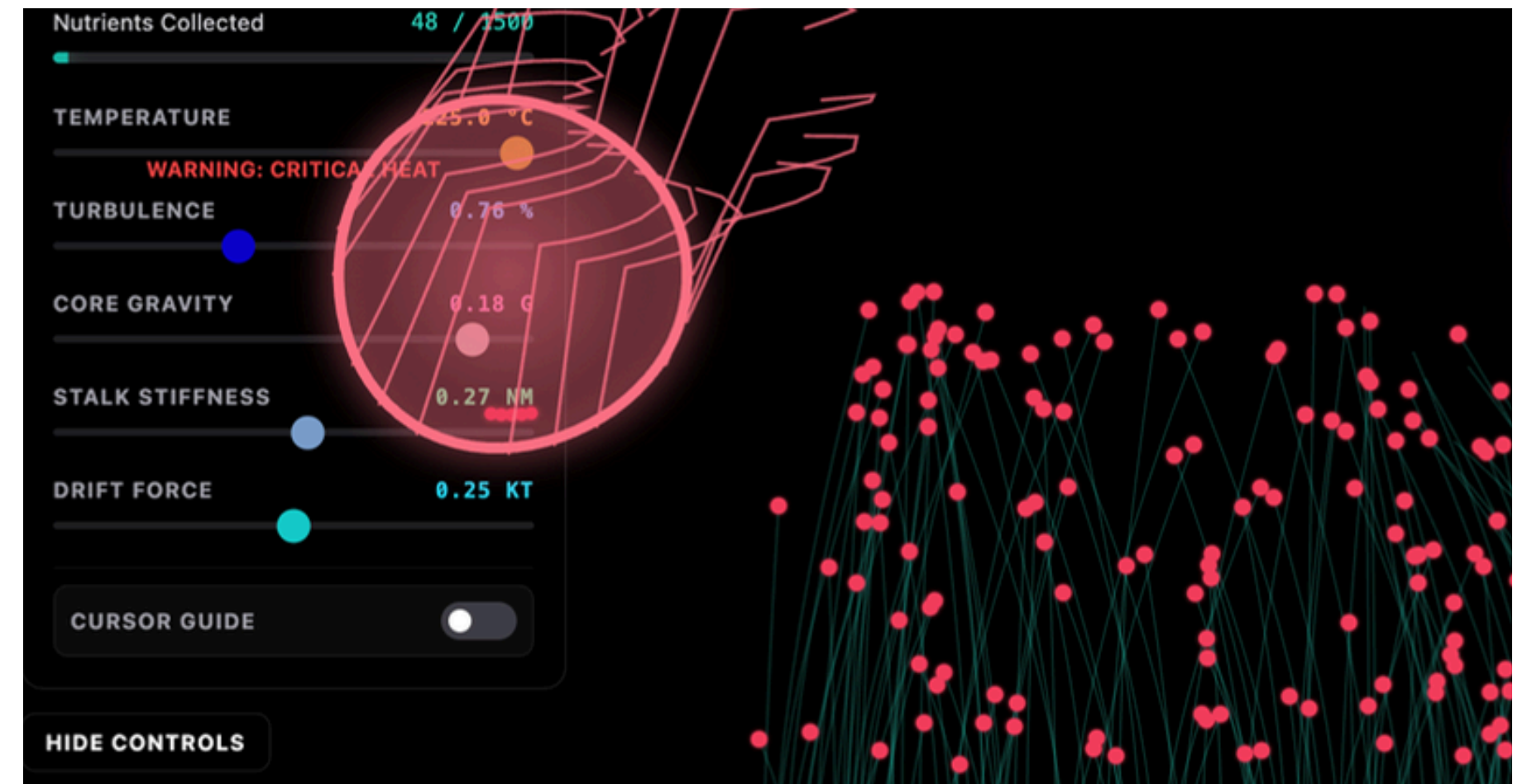
WRONG SUBJECTION / RESIST 2



CELLS - HACK 9

In this experiment, I introduced multiple control panels and allowed the system to adjust them randomly by itself. I founded that the system often increased the temperature to an extreme level, eventually causing the cells to destroy themselves. The system gained excessive control, but they don't know the "boundaries of survival."

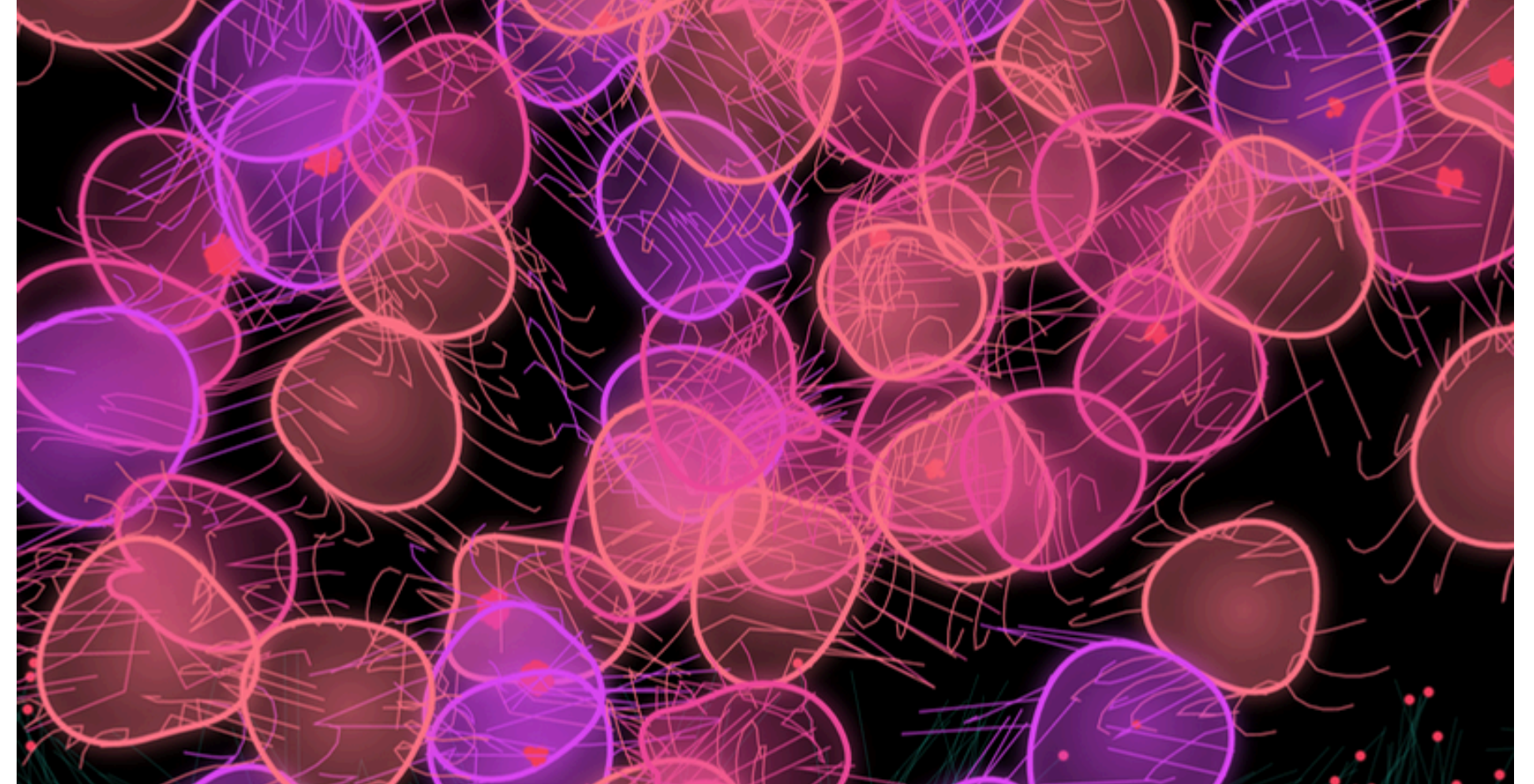
SELF CONTROL



CELLS - HACK 10

I noticed that when there were only three cells in the environment, each one could feed sufficiently. I then introduced a control for cell growth rate. When I increased it to the maximum, the system rapidly filled the screen with cells, but each cell could only access a very small amount of food. The system followed the instruction to grow, but this growth undermined the original condition of survival, each cell can only eat a little food.

SWITCHING ROLES



THAT'S ALL
THANKS FOR
WATCHING