

“Crystal” v0.7 Playtesting Guide

Before you begin playtesting, keep in mind that while you’re playing the current game, there are secondary goals.

1. Noise
2. Devices
3. Blueprints
4. Patterns

The game is organized around these ideas.

- **Noise** is a thread-safe library that allows citizens and AI to communicate with each other indirectly. (Observer-like; publish and query) The library's core allows 1000+ AI and 300+ citizens to communicate with each other using 20 data lanes. Devices prevent AI interaction enabling a citizen's safe passage.
- **48 devices** describe ways the player can see and manipulate their environment
 - Each device has a circular field that defines its area of effect (AOE)
 - Some devices have overlapping effects.
- **200K blueprints** are possible by combining up to four devices. Blueprints were inspired by Borderlands and its millions of gun combinations. In Crystal, players can create their own devices.
- **Patterns** combine two or more blueprints for rapid reconstruction.

Noise

Noise is how AI and citizens broadcast their location to each other. It’s a thread-safe Observer pattern and can be visualized using a GIS-like system within Crystal.

1. Noise Generation and Dissipation (Publisher)
2. Noise Suppression (Publisher)
3. Stationary and Mobile Noise Detection (Query)
4. Game Devices (Publisher or Query)

The game implements various noise layers; however, as you test, remember that the system is designed to be overlaid onto any 2D surface. The “Noise Library” is a SOLID implementation, which means the types of noise, how it dissipates, and how it’s suppressed and detected can be readily changed to have any meaning. A recent change that added citizen detection, dispatch and AI-murder machines took only days to add. This means it is easy to add and remove additional devices.

Devices

The game has implemented 48 devices split over eight crystal types. Each device has a circular area of effect (AOE). The radius of the area can be adjusted by applying more power to it. Some devices have overlapping effects. For example, three 125% speed mods give a 175% speed boost.

Blueprints

A blueprint is a way to memorize a combination of devices that might be useful to the player. Two to four devices can be combined, producing over 200K combinations. Players will add, change and delete blueprints over time as they discover new and more powerful combinations.

There are two different types of blueprints; Waypoint and Drone.

1. **Waypoint blueprints** modify a waypoint in a fixed location.
2. **Drone blueprints** create a flyable object with different capabilities depending on the devices used.

Patterns

A pattern is a selection of two or more blueprints. Three different types of patterns are supported; Fixed, Relative and Drone.

1. **Fixed Patterns** are used when you want to remember a set of waypoints in a fixed location. These patterns can be created using middle-mouse marquee selection or clicking a disconnected network segment.
2. **Relative Patterns** are specialized combinations of blueprints that can be “pushed” into an area as it’s built. For example, if you need to add tech suppression to a scanner in an alien-infested area. Using a relative pattern allows all the components to be built when placed in the world.
3. **Drone Patterns** are created when one or more follower drones are associated with a player drone. When this occurs, the followers fly in unison with the player to create a constellation. There is no limit as to the number of followers possible.