

Crystal Creatures Manual

1. Description and Idea

Crystal Creatures is a game, similar to the game Tamagotchi. The player can adopt a creature and do various interactions with it. The creature needs to be kept alive by feeding it, washing it, or playing with it. The creature will also grow over time. If the creature dies by neglect, the user can simply create a new one and start over.

The user can interact with the creature by dragging objects from an inventory over it. However, for some items, the user must do certain gestures like drawing circles for the effect to take in.

2. Manual

2.1 Start the app

When the app is started, a screen will appear that shows the red crystal logo and a Button to start the game. If it is the first time that the app is started, clicking the [Start] button will start the process of creating a creature. If a game file already exists it will go to the home screen and the creature.

2.1 Starting a new game

When a new game is started, a creature can be chosen by either clicking the [<] & [>] button or by swiping in either directions. Other than appearance, there is no difference in abilities and stats of the creature. The desired creature can then be chosen by pressing the [Select Creature] Button on the bottom. Now, the picture of an Egg appears and the creature can be named. If the [Enter] button is pressed, the creature will be saved and the app will switch to the home screen.

2.2 Playing the game

[1] The home screen shows the creature and its name. [2] There is a bar on the left bottom that indicates how much growth is left for the creature to reach the next stage. On the bottom right are two Buttons. [3] If [Items] is clicked, the inventory will open, showing 3 different items:

Donut: reduces the creature's hunger.

Brush: cleans the creature.

Crystal: turn on and off to enable enchantment.

To enable the crystal power, the crystal needs to be clicked and a message will be displayed. If the crystal is activated, the user has the power to raise the creature's happiness by drawing gestures on the screen. Drawing a circle will raise the happiness by 5, [drawing the circle 3 times] will raise the happiness by 10.





[4] The [menu] button opens a context menu where you can choose between [profile] and [new game]. The Profile shows the creature attributes about how hungry and clean the creature is as well as what species and its age. The [new game] option is for deleting your creature and start a new game with a different creature. The creature profile can also be opened and closed by pinch gesture (zoom in and zoom out).

The creature will become dirty and hungry over time and has to be feed to be kept alive. The maximum of hungriness and dirtiness will rise if the creature grows, leaving more time before it dies from hunger.

If the creature dies, the user is directed to the home screen and has to create a new creature.

3. Sources

Gesture Tutorial: <https://developer.android.com/training/gestures/detector.html>

InternalStorage class: <https://androidresearch.wordpress.com/tag/objectoutputstream/>

Pinch Gesture Detection:

http://www.techotopia.com/index.php/Android_Pinch_Gesture_Detection_Tutorial_using_Android_Studio

Gesture Builder:

[Custom gestures with Gesture Builder](#) (10th June 2017, 16:23)

[Android Studio Tutorial - Gesture Overlay View](#) (10th June 2017, 14:31)

[Gesture Builder App](#) (11th June 2017, 21:42)

SVG Tools:

[Inkscape](#) Tool to create vector graphics (12th June 2017, 21:16)

[Svg2android online tool](#) (12th June 2017, 21:18)

Game engine: Android-Apps entwickeln für Einsteiger, Uwe Post (Rheinwerk Verlag GmbH, 5. Auflage, Bonn 2015)