Rainforest

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Introduction

This project will consist of an intelligent system with capabilities to control abiotic factors that affect the wellbeing of plants, with the objective of improviing their health and quality of life.

Factors such as humidity and temperature, as well as the levels of light these receive, will be monitorized and analyzed frequently in order to verify and ensure optimal quality of life for the plants.

Thanks to these measurements, a series of alarms and different warning states will be implemented in order to better control the status of the plants and alert the users of their current situation.

Users will be able to easily install the system themselves, and interact and control it via a virtual assistant such as *Amazon Alexa.*

Context

Current situation of the presented problem

The market has seen its fair share of intelligent systems created to aid with plant irrigation control, and there are those that even come with a mobile app interface, such as Blossom, PlantLink or Edyn. Some of the newcomers to jump aboard the backyard-sprinkler train are the so-called 'intelligent flowerpots', like the one *Xiaomi* has recently started to sell, capable of watering the plants automatically depending on the humidity of the soil.

There are other projects like *GR0* that are capable of suggesting what plant species one should buy by analyzing the quality and type of soil one uses.

Nevertheless, none of these offers use any kind of virtual-assistant integration or any well-designed user experience, for that matter. *That* will be the main difference our project will have. Not only will the user control the system through a virtual assistant, the design and user experience is planned to be exceptional and extremely easy and intuitive.

End-of-project prediction

Once the course finishes, our intention is to have created a device capable of auomatically keeping alive crops or plants with interactions through *Amazon Alexa.*

In order to achieve that, our device will be able to give accurate weather predictions, alert of possible plagues that might attack the crops and monitor the optimal conditions for the plants themselves.

Target audience

This project aims to aid the gardening aficionados that do not have a great amount of time at their disposal to take care of their plants optimally. It also aims to assist farmers that need help with the care of their crops and seek to minimize the effect of unexpected and external factors to their produce.

Project Scope

Discarded Ideas

Used Technologies

Software Development Methodologies

Application Architecture

Business Model

Development Plan

Risk Assessment

Contingency Plan

Overview of the Project