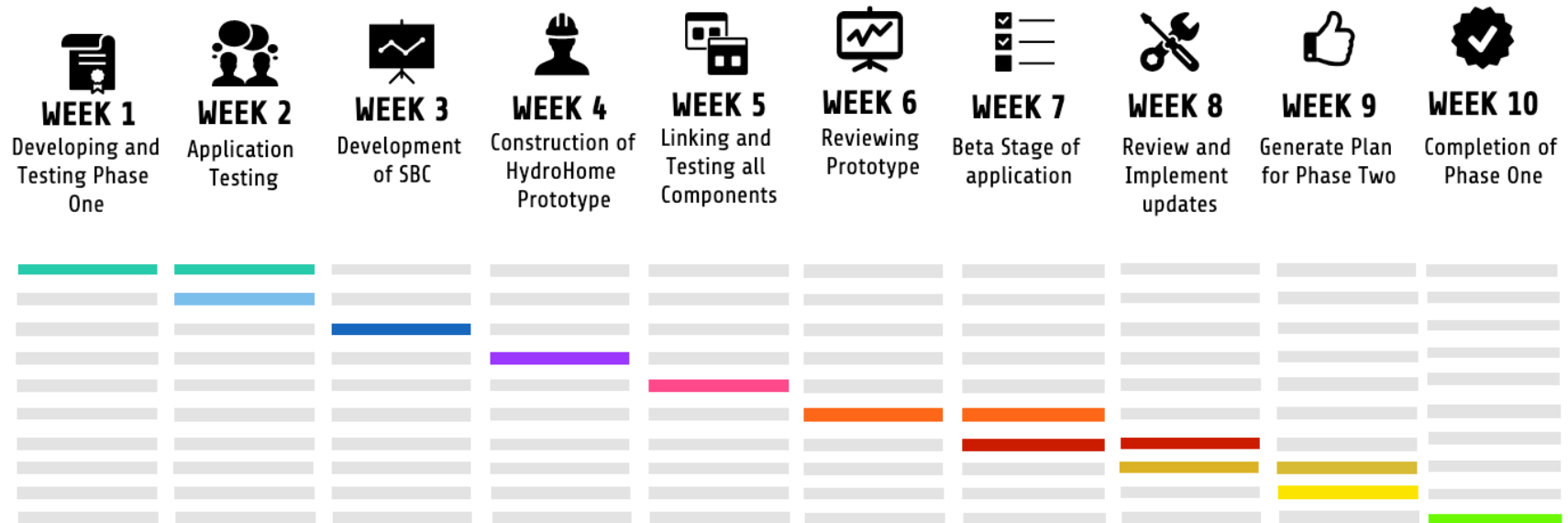


# STEMWORKS 10 WEEK ROADMAP



Developing and testing database, configuring it to our server

Liaise with suppliers for hardware, get quotes and delivery schedule.

Develop a marketing plan and begin planning for future research and development

Developing and testing the HydroHome app version 1.1 (1.0 is the prototype) and linking it to the final version of server/database.

Sign off on budget for the project

Begin development and testing of prototype control software for SBC network within the HydroHome.

Construction of basic HydroHome prototype.

Linking and testing all components.

Establish marketing plan.

Reviewing our prototype (alpha test) and developing phase one of beta stage

Implementing phase one of the beta stage, and reviewing generated data.

Rigorously highlighting areas in need of further development.

Reviewing requirements of previous week and implementing updates.

Reviewing data gathered in phase one for beta stage.

Generating plan for phase two.

Finalising supplier pricing.

Completion of phase one beta stage.

Initialising stage two.

Launch advertising campaign.

# WEEK ONE



## Developing and Testing

### Developing + testing our database and configuring it to our server

Once Phase One has launched the real work will begin. In order for the HydroHome to reach its full potential we will need to constantly tweak the features of the product in the initial 10 week launch period, (also known as Phase One). We have the basis for our database and we have planned for this framework to be expanded constantly through updates. The database will function with the HydroHome application and be the storage system for all recalled information the application will need to access. The database will be tested by team members and sample users to ensure that even an alpha version will give customers a clear indication of the service it offers.

### Liaise with suppliers

During this early phase of development we will also need to contact suppliers and make arrangements for pricing and stock levels etc. This will also be a time to consider our financial resources and assess what we can afford and for how long.

### Developing a marketing plan

A marketing plan will be essential for the later stages of this 10 week launch phase. We will be launching an advertising campaign in week 10 along with a more polished version of the HydroHome and application. Team members will need to begin contacting agencies to find an advertising style that suits our product and generate the most anticipation for our final product launch.

### Begin planning for future research and development

We can assemble data from the launch which will allow us to plan for future adaptations of the HydroHome, application and database. This will be an essential step in ensuring our product doesn't become outdated and we maintain a reputation of being a modern innovation.

# WEEK TWO



## Application Testing

### Developing + testing HydroHome app version 1.1

Once our product has launched the real work will begin. In order for the HydroHome to reach its full potential we will need to constantly tweak the features of the product in the initial 10 week launch period, (also known as Phase One). We have the basis for our database and we have planned for this framework to be expanded constantly through updates. The database will function with the HydroHome application and be the storage system for all recalled information the application will need to access. The database will be tested by team members and sample users to ensure that even an alpha version will give customers a clear indication of the service it offers.

### Link final version of server/database

During this early phase of development we will also need to contact suppliers and make arrangements for pricing and stock levels etc. This will also be a time to consider our financial resources and assess what we can afford and for how long.

### Sign off on budget

The budget will be a determining factor in the success of the HydroHome as we need to maintain a steady profit margin, while not compromising and purchasing cheaper materials. This would degrade the overall quality of our product and possibly create a bad reputation with clients on launch. The budget will incorporate all aspects of our project like hardware for the sbc and application testing, all materials for the product itself and even funding for advertising campaigns.

# WEEK THREE



## Development of SBC

### Developing + testing our control software for the SBC

One of the most interesting features of the HydroHome is the inclusion of a Single Board Computer. We will be using the SBC to run open-source machine learning software which will enhance the user experience. The SBC will be constantly gathering and processing all raw data collected by the various sensors within the system.

The Single Board Computer will proactively adjust the HydroHomes requirements based on the users climate and growth conditions. All of this information will be archived for further analysis and will provide a method of consistently improving growth conditions for plants within the HydroHome.

Any sensitive information the SBC collects, such as location, will be collected utilising Bluetooth Low Energy Technology which creates a secure wireless connection. This also limits the risk of hardware damage as physical components cannot be damaged by condensation or water spillage.

During week 3 our primary focus will be to ensure all of the components above are functioning as required across multiple systems. This will require rigorous testing and tweaking but we are aiming to promote the SBC as an attraction point for customers. This means it must be fully operational at launch.

# WEEK FOUR



## Construction of Prototype

### The basic HydroHome Prototype

Week four will act as a milestone in the project as we will be constructing our HydroHome prototype. Aside from assembling the Vertical A-Frame NFT Hydroponics system we will need to ensure the SBC, database, app and servers are all functional and interconnected.

After spending the last three weeks testing these components, they should now be in a state where they can interact with one another. By week six, we should be reviewing this prototype again and be able to confidently say the project is in Alpha.

This means that the construction of the prototype is essential to the project and cannot be delayed any further as it will offset the remainder of the project and affect other elements.

By now we should have made contact with suppliers and will have test materials. We will build multiple prototypes using the different materials to ensure which product maintains quality while being cost-effective. This will also create adjustments to the budget if a particular building material is selected during this construction phase.

# WEEK FIVE



## Linking/Testing Components

### Linking and Testing all components

The testing and linking of all components will be a continuous process even after the 10 week (Phase One) launch period is complete. We are selling and marketing the HydroHome as one complete piece. This means that every key feature must work as expected and even if one feature such as the application is not functioning as intended, the entire product is considered "non-functioning". The half-way mark of Phase One will need to a point in the project where we can confidently say we are on track and are meeting functionality requirements.

We will conduct testing by using sample data sets for plants. The data may contain characters and numbers that are outside of the parameters of the database and the database should be able to identify the issues and inform the user. The HydroHome prototype itself will need to be tested in multiple "simulated climates" to ensure the materials and other hardware components can function.

### Establishing a marketing plan.

During week five, it is expected that we have selected a marketing agency. With our chosen agency we will have listed all of the features we wish to promote and at this stage we will need to select our approach to advertising. Social media may be one of our key platforms for marketing as we are hoping the HydroHome becomes a trend. Here we will construct the framework for the launch of our advertising campaign in week ten.

# WEEK SIX



## Reviewing Prototype

### Reviewing the Alpha version

By week 6 it will be evident what changes need to be made to the application, database, SBC and the HydroHome itself. Testing of the alpha version should be complete and from here we must make some definitive decisions regarding materials and suppliers. After a week of having an interconnected and functioning prototype we have all the information we need to lock in a contract with a supplier.

### Developing beta stage

Now we will look ahead to the final hurdle. We must develop a product closer to our final vision of the product and begin to create something which will be available to the public. Testing must become more intense with a greater quantity of sample data and simulated use.

# WEEK SEVEN



## Beta stage of application

### Implementing Phase One of the Beta Stage

The beta stage will obviously be a modified version of the product based on all of testing and developments generated in the alpha stage. We will need to focus on the application refinement now as we are coming closer to the end of the ten week launch period. An application is a crucial element of any modern product but ours is technology-focused. This means it must be created at a very high standard.

In Phase One the Stemworks team will focus on the changes that must be made and begin to test and implement these further innovations over the coming weeks.

### Reviewing data generated from Alpha Testing

The data collected from the extensive testing process in alpha will now be utilised. Shortcomings and bugs will be evident and all members of the team will now be resolving these issues in order to advance with the project. Each team member will be assigned a component to address. For example, the software team members will be examining any improvements required for the single board computer.

### Highlighting areas for future testing

During the alpha testing process, opportunities for further innovation will be highlighted. These may not have been evident when we were initially discussing the ideas for the project but after practical testing, new features may be generated and team members will begin to develop a plan to implement these ideas after the ten week period has concluded.

# WEEK EIGHT



## Review and implement updates

### Create a review of results from the previous week

The Stemworks team will hold a meeting in week eight, discussing the results from last weeks testing and analysis. A collaborative meeting like this will allow for different team members with varying skill sets to give their opinions and in turn, create a more well rounded and considered product.

### Implementing updates

Updates will be released to team members for further testing. It is essential we test to the same degree with every iteration of the product to maintain a high standard of quality. Updates are a big task and very time consuming as we can't just release an overall update for the HydroHome yet. Updates will have to be applied to each component (app, sbc etc.). Once we have a complete public release, the updating process will be less time consuming as we will release updates in a consumer friendly version. This means one update will apply to all components of the product.

# WEEK NINE



## Generate plan for phase two

### Generating Phase Two Plan

Phase Two will be very similar to Phase One in terms of the way the plan progresses but this time it will be far easier and less time consuming. We will already have multiple testing protocols in place and team members will be very familiar with these. Bug testing will become a priority as once the framework is down for the components, major updates are less common and tweaks and improvements become the norm.

Phase Two will also be a time for the innovations suggested in weeks seven and eight to become a reality. Planning will be in place for the creation and testing of these improvements to take place in the following ten weeks.

This is an exciting time for Stemworks as we are nearing completion of the ten week period and can begin to look to the future of the company and the HydroHome itself.

# WEEK TEN



## Completion of Phase one

### Finalise supplier pricing and contract

This week we will sign off on a contract with our suppliers. We should have a basic idea of demand for our product and we will order the appropriate quantities of materials. After extensive testing in the alpha and beta phase, we will know which materials work best for our product and which are most cost-effective.

### Launch advertising campaign

The marketing agency we signed with will have completed our campaign by this stage and will be able to showcase our product. We are hoping this drums up some anticipation for the official launch and will create a following for future updates and developments.

### Completion of Phase One

At the conclusion of the ten week period, we will have worked tirelessly to complete a working prototype and to reach the beta stage of testing. The team will likely take a short break to recover before Phase Two commences.