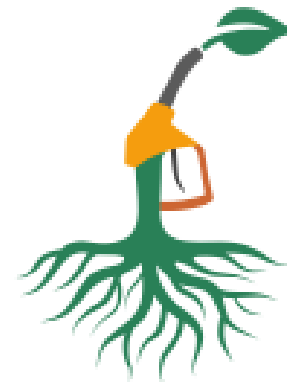


By Arturo Lopez

Green Futures Biofuel



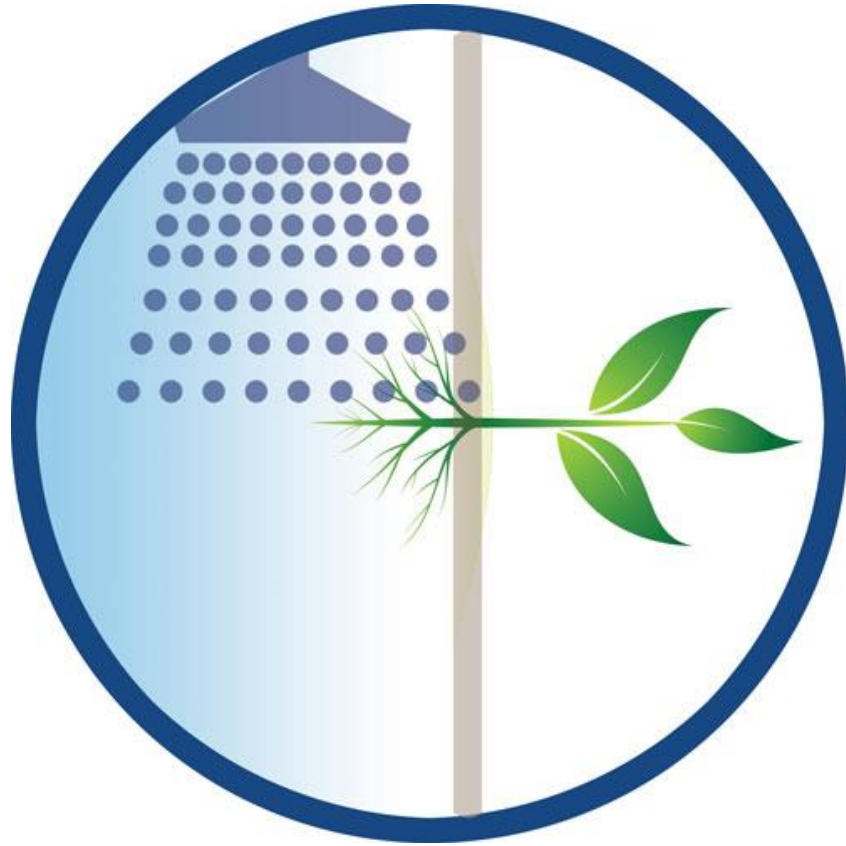
GREEN
FUTURES
BIOFUEL

Introduction

Green Futures biofuel is a renewable energy and vertical farming company


We specialize in affordable and commercially viable vertical farming systems.

We are looking at creating the worlds first effective vertical farming leasing model and energy efficient vertical farms



- A vertical system that sprays the plant roots with a nutrient mix so that they get the correct quantities of nutrient and water and they also get good oxygen circulation and absorption to aid fast, healthy growth.

What is aeroponics



What can we grow

- Most fruit, vegetables, herbs and salad crops will thrive in the system. We have been revisiting older varieties to get a fuller flavour as the system gives a higher and more consistent yield even when using these varieties.

Progress



We have spent the last two years researching off grid aeroponic systems.



We purchased a small piece of land in the highland and islands, built a small polytunnel and conducted research on growing organic produce in a variety of systems.



We have worked with the highland and island business hub and small communities to implement modern off grid farming techniques



We have been offered to pitch our findings and project at the EPIC open day on the 24th of September.



We have been allocated space within the polytunnels that are currently being constructed on campus,. This will act as a showcase and reference point for customers and partners

BUSINESS OPPORTUNITY



- Green Futures are trying to create an affordable Urban farming business to allow individuals to gain the ability to grow organic produce and overcome the uncertainty of Brexit.
- Once this process has been implemented green futures wish to create a commercially viable aeroponic system to improve current farming techniques.

Problem/ Opportunity

Indoor vertical farming



- Climate Regulation (Temperature and Humidity)
- Air Circulation depending on the system being used
- Logging of Data
- How to make it more commercial

Main Challenges

Affordable Urban farming

- Current Urban farming equipment is unaffordable
- Being able to manufacture the right system for the individual or company





- **Urban growers**
- **We will be looking at targeting off grid communities, home owners (30+ and have there own garden and home)**
- **Retail Chains**
- **Independent Garden centres**
- **Farmers**
- **Schools**
- **Bars and restaurants**
- **Breweries**

Customer Segments



- Green Futures will provides educational events and thought leadership around plants, food and sustainability. We use innovative farming techniques as a backdrop for learning.
- Aquaponics, aeroponic, hydroponic Course and training
- School Programs
- Corporate events
- Selling the urban farming equipment online to a large number of growing enthusiasts.

USP – Leasing model and intensive marketing and advertising

Additional Revenue streams



Sales and marketing

- **Customer retention**

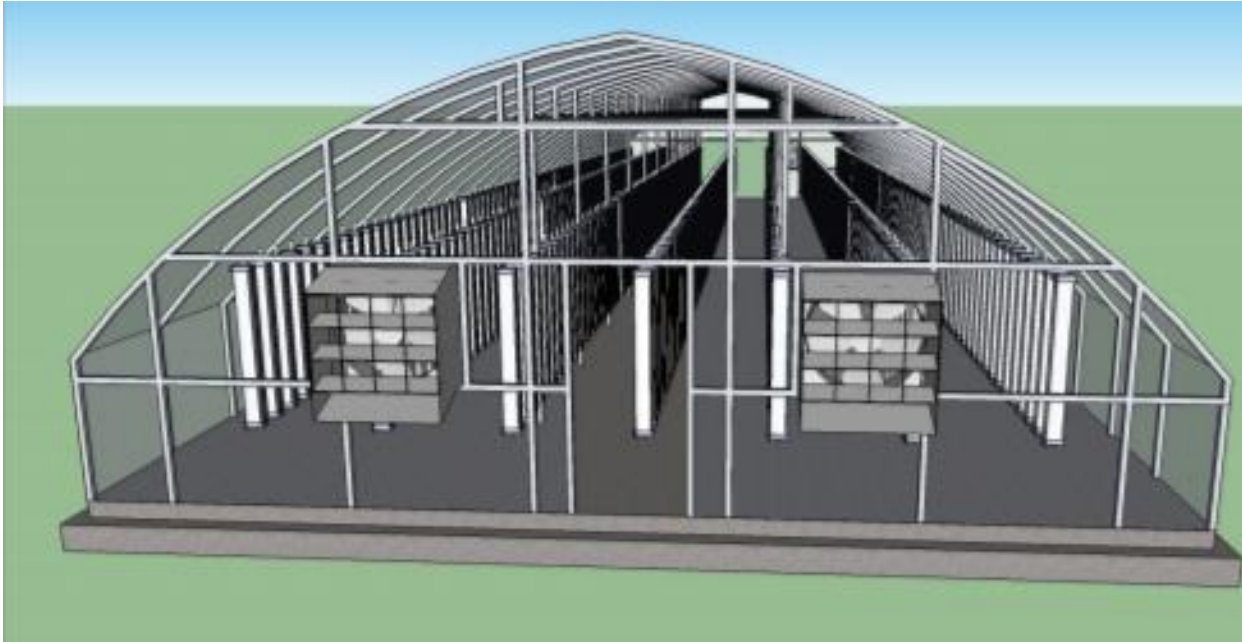
We are looking at engaging the customers through:

- Various multi channel marketing campaigns
 - Email campaigns
 - SEO
 - Articles
 - Blog writing
 - Subscription blogs
 - Education
 - Training
 - Competitions
-
- **End goal – to create a community of urban growers**

Innovative solution

- We are looking at creating a commercially viable Aeroponic system.
- We are looking at creating a system that is transportable and doesn't rely on heavy infrastructure.





- 90% Water Saving
- Space Efficient
- No Nitrate Run Off
- No Herbicide
- Low Labour Requirement
- 365 24/7 Production
- Eliminates Soil Based Pathogens
- High Return Crops on Low Return Soil
- Clean, Consistent Produce
- True Precision Farming
- Reduction in plastics

Commercial Vertical Soilless Growing

Partners

- Dents Farm – Private farm who have asked to be stockist of the produce
- University of Essex computer science and biological science have allocated space in their polytunnels for our hydroponic and aeroponic systems
- Highland and island enterprise has provided an extensive list of farmers with in Scotland who would partner with us.
- Kalsi plastic – Manufacturers
- Amtek plastics – Plastic moulding supplier
- Glideology – Prototype developers





- Aponic
- Lettus Grow
- Zip grow

Competition



- We are a values driven company
- We care about people, profit and planet.
- We can Do Good and Make Money
- We showcase the most sustainable technology and systems for food production
- We think that better education around sustainable food is essential for transforming our food system

OUR VALUES