



## Farmforce Case Studies: Subati Herbs Kenya

*Digital input traceability enables herb exporter to rapidly resolve customer concerns, ensuring food safety integrity and confidence*

Exporting high-quality herbs across Europe, Subati operates from an expansive greenhouse complex in southern Kenya. From its launch in 2016, Subati has rapidly grown their herbs operation, realizing in 2017 that in order to maintain the highest food safety standards, quality certifications and full traceability through production, a digital farm management system was required. The Agribusiness Advisory Team at the International Finance Corporation (IFC), part of the World Bank Group, was already in discussions with Subati and was keen to support testing out agricultural technology solutions. IFC strives to enable the development of agribusinesses in emerging markets, facilitating competitive access to global markets.

*"You can't do farming without Farmforce; you can't be an effective exporter. It's business critical to have digitization to make it all work so you can address demands from international customers."*

- Jacque Njonjo, Africa Lead at IFC Food Safety Advisory

### Rapid Response to Chemical Residue Enquiries

Prior to deploying Farmforce in 2018, all records were manually kept on paper, requiring a room full of binders to keep track of the status of all greenhouse areas and what specific chemicals were applied to each crop. While this system has been used in the horticulture industry for years, it has limitations as production scales and companies need to precisely track and trace inputs applied when customers request or have concerns. Since food safety is the highest priority, ensuring strict adherence to maximum residue levels (MRLs) of approved inputs (fertilizer, herbicides, pesticides) on all herbs exported to clients in Europe and around the world is 'business critical.'

### Reducing MRL Risks, Properly Responding When They Occur

When customers receive herbs from Subati, they do standard testing to check for any chemical residue. If an issue is detected, Subati has only four hours to respond, explaining why the MRLs was exceeded, or why there may be residue of a chemical not expected for that crop. If the exporter fails to adequately respond during this 4-hour window, they risk having all their products immediately rejected by that customer,



*Safety-focused and compliant chemical storage and application system at Subati*

causing huge financial losses and tarnishing their reputation. **This can bankrupt an herb producer – and is a key reason that Subati decided it was critical to invest in Farmforce.**

*“We use Farmforce’s traceability features every day. When there was an issue with marjoram MRL from the customer, we quickly went into the raw data in Farmforce to trace the product - what chemicals were applied and when. With Farmforce, in less than 15 minutes, we can see the exact situation and then figure out the root problem. It used to take hours, but now customers have confidence with our quick response supported by digital data from Farmforce”*

-John Kibiwott, Operations Manager

MARJORAM



### Digital Trouble Shooting and Issue Resolution

With the marjoram issue, the chemical residue found by the client was not a chemical that should have been applied, so where did it come from? The Subati team quickly confirmed in Farmforce that that chemical was not applied to the marjoram in question, but could see that it was applied in a different section of the greenhouse. Since the chemical was applied via the irrigation system, they determined that must be the source of the contamination, locating a valve in the irrigation system where the chemical was getting ‘stuck’ and staying in the irrigation system even after the chemicals were flushed out.

Having a simple digital platform to have complete oversight of all chemical applications – when, where, by whom – made this troubleshooting quick and efficient. John explains, *“it would have taken at least four to five times longer (many hours), to go through all the physical paperwork, involving many more staff, distracting from normal operations.”* If they could not determine this within the four hours allowed by the client, the client could think one chemical residue issue would indicate much larger food safety issues at Subati, risking ruining their excellent reputation.

*“How do you measure the value of a seatbelt or an airbag? You have to be in a situation where the integrity of a system is tested - you don’t appreciate its value until it’s tested. When grocers have an issue, they go to suppliers – Farmforce gives the food safety data so customers get a print-out from a reputable system, a system established to ensure data integrity. You can’t manipulate it. **Farmforce gives our customers confidence in us, in our integrity.**”*

- Thomas Skaper, Subati COO

### Quality Certifications to Access Markets

In order to sell in global markets, and contract with major supermarkets and wholesalers, Subati spent 1.5 years in extensive application, audit and quality control processes to receive certifications. They proved their operations adhered to the highest levels of food safety, staff training and responsible input use with a robust traceability system. Certifications like Global GAP require yearly audits, and that is where having all the data on input applications, planting dates and staff safety training comes in handy.



*Greenhouse full of Basil, ready for harvest, packaging and export to the UK.*

Prior to Farmforce, Subati would maintain 50+ binders of data sheets and would have to spend days sorting through them to fulfill the specific requests from the auditors – now all the data is digital and can be selected and printed for the auditor in minutes – saving valuable time for Subati staff and expense with the auditors. For example, audit points for spot checking on pre-harvest intervals (PHI) check that crops are not harvested within a certain number of days based on what input was applied. Farmforce has automatic features that pops up an alert if the mobile user tries to record a harvest collection within a PHI, providing a safeguard against harvesting early, and then having herbs rejected by the customer when doing chemical residue tests. With the alert in place, Subati is confident of both food safety, and passing the audit.

### *Customer Confidence in Reliable System*

When meeting with new potential clients, having a robust digital traceability system in place is key, and is now expected of suppliers selling high quality herbs and other horticultural products. Customers need that reliability factor - the ability to ask their herbs supplier about specifics in the production and receive a quick, professional response backed up by transparent data from Farmforce. Thomas Skaper also notes that if any smaller scale producers want to sell to internationally, *“they need software like Farmforce to access those markets. They can’t just use paper anymore, it wouldn’t be accepted by Tesco Nurture or Farmer to Fork standards.”*



*Greenhouse staff discussing and practicing on Farmforce during a training.*

### **Farmforce ROI and Ways Forward**

*“Using Farmforce isn’t just about financial gain from operational efficiencies; we’re in the business of food production and the level of integrity required is akin to mother and child. While we can calculate the cost of disruption and loss of business, if there is a food safety issue, the potential loss of reputation is too huge to put a number on it. Farmforce helps us maintain the highest levels of food safety and to proactively avoid mistakes that can destroy the business.”*

- Thomas Skaper, Subati COO

As Farmforce is used across Subati’s operations, the team looks forward to further leveraging the digital data on the platform to better track their year-on-year production and performance. As they use the system across more seasons, they can compare their output in volumes, input efficiency, staff hours, and other key performance metrics to more robustly determine optimal production strategies. The Farmforce team will continue support Subati through developing custom reports and conducting team trainings to ensure that we continue to thrive and grow together.

***Farmforce** strives to build trust and transparency in the agricultural first mile. We deliver digital solutions to secure sustainable sourcing, improve farmer quality of life and protect the environment. Through a bush-proof web and mobile platform, refined over eight years, clients have visibility down to the field level while building a fully traceable supply chain. Farmforce is used in 32 countries across Africa, Asia and Latin America to manages over 520,000 farmers in 45 crop value chains and 15 languages. Find out how Farmforce could help you at [www.farmforce.com](http://www.farmforce.com) or contact us at [info@farmforce.com](mailto:info@farmforce.com)*