

Solar dryer domes for better quality and profitability

The Sau Nhung Coffee Production Cooperative was established in 2012 with the aim of supporting its members to improve the quality of their coffee production and to eventually transition to organic farming practices. The 113 members joined together to assure the sustainability of the household coffee production and achieve higher profitability through access to higher quality markets.

Uncontrolled coffee quality during traditional drying processesThe current on-farm coffee processing practices have often

resulted in insufficient or inconsistent coffee quality. In addition, the practice of drying the beans under the sun leads to high post-harvest losses of 30 to 50 percent (sun drying, coal and wood fired). The resulting low profitability has limited the cooperative's ability to invest in further quality improvements and to expand its positioning as premium coffee farmers.

Controlled drying process with solar dryer domes

The approach proposed by the Sau Nhung Coffee Production Cooperative consists of centralising the drying process at the cooperative level and investing in solar dryer domes from Covestro. The solar dryer dome is a greenhouse-like shelter made from super-durable polycarbonates to dry crops. The application for coffee is new. Automated sensors control the temperature inside; the fan and ventilation system are powered by a solar panel which also provides heating if needed. The domes allow a high degree of control of the drying process and result in higher and consistent quality. The investment in the domes is expected to pay off through their longevity and through price premiums resulting from the consistent and higher quality of the coffee. Outside the season the domes can be used for other crops, providing additional income for farmers.



Project overview

Term: 2019-2020

Region: DakHa District, Kon Tum Province, Vietnam Partner: Sau Nhung Coffee Production Cooperative Volume: EUR 19,800 (supported by the Fund)

EUR 44,842 (total volume)

Goals

- Increase the profitability of Sau Nhung coffee farmers through higher quality coffee production.
- Reduce post-harvest losses.
- Demonstrate the economic viability of the investment in high-quality solar dryer domes.





