



Experience by Young Africa Agri-Tech Dondo

In Sofala/Mozambique

Background: Some fields of the YAAT farm in Dondo have deteriorated over the years and soil fertility is declining. The price of fertilizers is high and increasing rapidly. The soil is also low in organic matter and test results recommended the addition of 2-3 tons of organic material per hectare.

The solution: Collecting cow dung for the production of Bokashi compost for the use on the farm. Bokashi can improve soil structure and fertility, help reduce greenhouse gas emissions and production costs, while promoting sustainable agriculture, soil conservation and environmental protection.

Experience description

Description of the project: The necessary ingredients for Bokashi were cow dung, charcoal powder, fresh milk, dry straw, fresh grass from legumes or cereals, sugar and ROYAL (rice- and wheat bran flour mix with essential microbes) plus water. These were mixed and covered with a black plastic sheet. After 45 days of fermentation the compost was ready for use. We mixed 5% of our Bokashi with another 15 % of dry grass plus 80% of black soil, filled it into sacks and grew tomatoes and green peppers in it. We achieved good results from it.



Other characteristics



IMPACTS

- Higher crop yields
- Savings on fertilizers
- Improved soil conservation, fertility and structure
- Climate friendly
- Reduction of greenhouse gases
- Sustainable agricultural practise
- Healthier food
- Educational benefits



CHALLENGES

- Limited availability of cow dung
- Collecting the dung
- Ingredients such as milk and sugar maybe too costly for small farmers
- Royal bran Bokashi mix may not be available everywhere



LESSONS LEARNED

- Lesson 1: We learned how to make Bokashi to improve soil fertility and to obtain higher yields.
- Lesson 2: It would be better to do a controlled trial to determine how much yield increase was actually achieved compared to chemical fertilizers