



For the last 34 to 40 years, Wageningen UR, a university in the Netherlands, has trained over 500 Ethiopian students to carry out research and develop technologies aimed at improving Agriculture. The University is not new to working with the Ethiopian government in the area of improved seeds, increasing productivity as well as creating linkages between government, private sector and farmers. The President of the Executive Board of Wageningen UR, Professor Louise Fresco was in Addis Ababa and Capital's Eskedar Kifle spoke to her about Ethiopia's agricultural challenges, performance and the key for increasing productivity.

Capital: Tell us about your university.

Professor Louise Fresco: We are the number one center of excellence for everything in the areas of food, agriculture and environment, internationally. We have been training African and Ethiopian students for the last 35 to 40 years. We have trained more than 500 Ethiopian students. For example, the President of Addis Ababa University was in my class, so we have many alumni and we always specialize in issues related to agriculture, food, development, environment and irrigation. I visited Ethiopia for the first time in the early 1980s and I have been following the country's pathway ever since; I am very pleased to see how things have changed and how strong the government's agricultural policy is.

Capital: Do you work with other African countries to support them in their Agricultural development?

Fresco: Ethiopia is a very special case for us because we have trained so many people from here. But in Africa itself we are the largest trainer of PhD students in our field; we have trained over 1,200 PhDs in food and agriculture. No other institution in the world has done that. I came to Africa even as a student, so our relationship with the continent is a very long one. Because of that we do not come with Western models or Western solutions. I have grown up as a student already learning about Africa and we have always had a model of work which is a dialogue. So it is not us coming in and bringing a European solution for an African problem; we want to understand and grow with you and see what we can do to assist and find your solutions. For me that is a different approach from other countries.

Capital: Do you think that has been a problem, other countries or institutions trying to bring their own idea of solutions to some of the problems that Africa faces?

Fresco: I don't want to pass judgment on what others do, but I think if you don't have the

cultural sensitivity and the understanding that these are long-term processes, and you just come and say we need to mechanize agriculture, it is not going to work. First of all, Ethiopian solutions must be thought of by Ethiopians. But on the other hand, Ethiopia can of course get inspiration from other countries not only from the technical side, but also on the institutional side.

We are not here to sell technology; we are here to think of solutions. I think one of the reasons why the government likes to work with us is that we have spent a lot of time trying to find linkages between the government, private sector and universities. I have worked in many countries in Africa, Asia and Latin America and I think there are two ingredients for success; one is that a country that neglects its agriculture cannot develop. There is no country that has gone into industrialization without looking at its rural areas, you need to develop agriculture and it needs to be a priority.

African governments have had the Maputo agreement (where they agreed to spend at least 10 percent of their national budget on Agriculture) but Ethiopia and Ghana are the only countries that have taken it seriously, and that says a lot.

You also need the involvement of the private sector because it is not the government that is going to grow the wheat or bake the bread, so you need a good linkage between the government and the private sector. You also need universities and centers of excellence so you can learn from lessons of elsewhere, not by copying them, but by being in tune. So having Ethiopians that have been trained overseas, interacting with Dutch students but also those from other countries, gives them an exposure and an open mind.

Ethiopia has been very capable to find its own way, but using experiences from elsewhere turning it into an Ethiopian blend. In my experience, when there is an explicate government policy that does not neglect the rural areas; a private sector that is vibrant and can attract sufficient credit, that is there not for quick gains but to invest in the country; and then you have universities that really train people, not only for the benefit of the private sector but also to help the smallholder farmers. If you have all these things together, it is a model for success. I think Ethiopia has that much better than many other countries.

Capital: There is a supposed conflict between smallholder farming versus large scale farming. Do you think farming has to be one way or the other for Ethiopia to increase its agricultural productivity?

Fresco: That is a very relevant question because it kind of points to a dichotomy; you either have large farms or you have small farms. I think Ethiopia, like most countries, has a range of farm sizes and the quality of the work on these farms is more important than the range. You can be a horticulture farmer on a small area of land, you have to get the maximum out of that land and that is not what is happening right now, yields are very low on small farms but they are also low on large farms.

I think one of the most important things is to see how government can promote investment and of course companies will not go for the small farms; they want to go for a larger scale farm. The best situation is where you have a combination of farm sizes so those that want to invest, can also invest in the larger sizes but you cannot just create a labor to decrease the rural poverty because large farms mean total mechanization and will not have possibilities for small scale farmers.

I think in two generations a lot of people will have gone out of farming anyway and the farm sizes will increase and in some areas where there are really very few opportunities, where the land is marginal and dry, people will move out of farming completely. So you will see a shift in

the question of large or small as the country develops. I think it is a good idea to create investment opportunities for all farm sizes and what farm size is optimal really depends on the area.

Capital: The country is also working on experimenting with GMO seeds; mostly for BT cotton but with the plan to use the technology on food crops as well. Do you think that is the right path to take for the country to increase agricultural output?

Fresco: Again this is a very relevant question. My position on this is that you cannot generalize on seeds. It very much depends on the purpose and also on access of farmers or the government or of the public research sectors to those seeds.

There are a number of cases where we know that you can really improve seeds and it really can make a difference. In areas which you have diseases in which there is no resistance in the crop itself, you can take the gene of a close relative of that particular crop and mix it to get better yield and better resistance to the disease that affects it. After testing, the government could say yes we allow that. Another example is when GMO adds to nutritional quality or increases shelf life. We know that, for example, tomatoes rot very easily and an enormous amount of tomato yield in Ethiopia is lost because it rots due to slow transportation. There are some genes that allow tomatoes to have longer shelf life.

So for specific cases and specific purposes, I think it is important. It is a complicated issue, Europe in that sense is very reluctant, I believe, for the wrong reasons because there is often a lack of understanding. Governments and other stakeholders just don't want to take a decision on it, although Europe has a very good system of assessing risk objectively, but all kinds of things are hanging in the political arena.

I don't think that will happen in Africa. The African scientists are saying it is going to be an African decision, we want to do this and we want to do it for the good reasons and we will have good checks and balances. And biologically speaking, as long as you monitor, there is no reason to reason to fear there will be risk. Africa is not just launching to the unknown, we have had decades of experience, all this time there have not been any problems that are different from growing regular crops.

So I think there is good evidence but it also needs to be specific to the crop and to the purpose. You have to make sure you don't increase the dependence of farmers unnecessarily and you include Ethiopian and African researchers in managing the intellectual property rights and so on.

Capital: What is the reason for EU restricting GMOs?

Fresco: I think it is basically because of a lack of understanding; genetics sound complicated and there is always a bit of fear. But we also have to understand that one of the main differences between Europe and Africa is that Europe is very well-off so they can afford to sit back and be afraid of things. In Africa and Asia there is a real drive to find the best solutions.