

2017: Crop production often a tight margin business – but: Argentine, Canadian and Eastern European farms rather profitable. Chinese crop production very intensive and heavily subsidized

From June 4th to 7th about 50 international agricultural economists met in Beijing for the annual agri benchmark Cash Crop Conference which was co-hosted by the Chinese Academy of Agricultural Sciences. Agri-benchmark partners from Thailand: Associate professor Somporn Isvilanonda and Dr. Piyatat Pananuruk (Knowledge Network Institute of Thailand), Assistant professor Thanaporn Athipanyakul (Kasetsart University), Assistant professor Dr. Orawan Srisomphun (Mahasarakham University), and Dr. Pipat Veerathavorn (The Sugar and Bio-energy Producers Association), were presented.

All in all, crop production remains a tight margin business, some – mainly EU farms – even struggle to cover their cash and depreciation costs. Hence, reducing cost is of utmost importance for many producers. The overall development in crop farm profitability is somewhat divided: in 2017, many typical EU farms as well as others performed below the 2014-2016 average, while many farms in the Americas slightly improved against the trend. In particular, most typical farms in Argentina, Canada, Russia and Ukraine were profitable in 2017. Sugar cane and sugar beet production is suffering substantially because of the sharp and ongoing decline in global prices. Thomas de Witte from *agri benchmark* Center: “In the EU, sugar beet margins are down by 60 to 80 % compared to previous years.”

Despite tight margins, output has not been reduced so far. On the contrary, the newcomers in global commodity markets in Eastern Europe and Latin America boosted their output in recent years. Consequently, global commodity markets are growing at a remarkable pace: since 2012, the top 10 soybean producers increased exports by about 8.2 % p.a.; in corn the annual growth rate was 7.4 % and in wheat 4.9 %. Since OECD/FAO are projecting a sharp decline in growth of demand for grains and oilseed it should be just a matter of time until we see a further drop in global commodity prices. The coordinator of *agri benchmark* Cash Crop, Yelto Zimmer, concludes: “We will invest to explore how growers will adjust in case this change will indeed happen”.

EU Wheat: poor performance and challenged by environmental issues

A special analysis of wheat production revealed that in the more developed countries very often wheat performs poorly compared to other crops in the rotations. Consequently, when possible, growers in countries such as the USA or Canada are reducing their wheat acreage. However, very often it is not easy to significantly expand other crops because of disease pressure and/or low margins of alternative crops.

However, due to tighter environmental regulation and increasing resistance issues in weeds and pests, EU farmers are forced to diversify their rotations. The French *agri benchmark* partner Baptiste Dubois states: “On-farm research reveals that wider rotations and changes in tillage systems can not only save crop care products and reduce the likelihood of new resistances but also increase profits.” In the years to come, *agri benchmark* will be part of the scientific community working on the feasibility and profitability of more diverse production systems that are able to cope with the new challenges.

China – with high subsidies towards cooperative farming

The farm tours in China and the scientific exchange with Chinese economists revealed the strong and increasing financial support for crop production: import tariffs, minimum prices, area payments and input subsidies are very important for wheat, rice and corn. This leads to domestic grain prices being

up to 60 % above world market prices. Furthermore, cooperatives investing in machinery and installation investments such as irrigation are subsidized by up to 80 %. The downside from this development: land rents are very high, which makes it hard for producers to grow their business. The Chinese government puts a lot of effort in to the creation and growth of cooperatives and so-called conglomerates which are basically private companies: in 2016 more than 44 million farmers were members of a cooperative – up from 1.3 million in 2008 (+ 3,200%). Cooperatives can be everything from purchasing inputs and selling outputs to joint production. The business model of the latter is based on two pillars: either individual growers stop producing themselves and just rent out the land to the cooperative; alternatively, they remain operators and outsource some key operations such as seeding and harvesting to the cooperative. The management of a cooperative can be partially organized like a private company.

Crop production in the north of China is very intensive: more than 200 kg N/ha for 8 t/ha of corn are very common. Due to the short growing season and cool springs, potato ridges are often covered with plastic sheeting. With regards to mitigation of greenhouse gas emissions, it appears that China has huge potential by adjusting fertilization to actual crop needs. This was the conclusion from a presentation that Daniel Tudela from the German *agri benchmark* Center gave.

Thai cassava value chain – role model for Africa to generate income and jobs?

Orawan Srisompun, co-author of a report for FAO and Thai *agri benchmark* partner: “The Thai cassava chip and starch value chains provide important income-earning opportunities to rural households, not only in primary production, but also in contracting services and – to a lesser degree - in processing”. Processing for cassava chips is a small-scale but profitable enterprise, while processing for starch relies on significant investment and development of infrastructure to handle the large volumes of cassava required. The evolution of the Thai cassava sector provides some suggestions for how African countries may develop cassava as a cash crop to improve smallholder incomes. The respective report will soon be available at the *agri benchmark* Center.

USA vs. China conflict on soy – little impact on cropping patterns in the USA

Michael Langemeier, *agri benchmark* partner from Indiana, USA, presented his analysis on the competitiveness of corn vs. soy in the US corn belt. It turns out that current price ratios very much favor the corn-soy rotation in that part of the world. Only if US soybean prices were hit by more than 10 % (app. 35 USD/t) - and corn prices remain unchanged – would farmers possibly consider moving to a corn-corn-soy rotation. As Langemeier states, “As of now, such a sharp drop in relative prices seems to be unlikely. Hence, I don’t foresee major changes in cropping patterns even with turmoil in global soy trade.”

Media that is interested in further details please get in touch with Associate Professor Somporn Isvilanonda (somporn@kinit.or.th) or Dr. Piyatat Pananurak (piyatat@kinit.or.th) or with Jeanette Malchow (jeanette.malchow@agribenchmark.net) at the *agri benchmark* Center in Germany.

agri benchmark Cash Crop is a global non-profit global network of agricultural economists, coordinated by the Federal German Thünen Institute and the non-profit company global networks. Its aim is to generate and disseminate reliable and usable analysis on major trends in global crop production for decision makers. For more information please visit www.agribenchmark.org