

PUM



Netherlands senior experts



PUM AND THE GLOBAL DAIRY SECTOR IN EMERGING ECONOMIES

dr. Le Chen

Introduction

Who is PUM?

PUM Netherlands Senior Experts is the largest private-to-private volunteer organisation in the Netherlands committed to sustainable development of small and medium-sized enterprises (SMEs) in emerging economies. Our vision is a world in which entrepreneurship drives sustainable development. To us, SMEs are the backbones of a sustainable economy and the catalysts for innovation, job creation and sustainable growth. The sustainable development of SMEs contributes not only to the economic growth, but also to the environmental as well as societal aspects of an economy (such as waste management, energy saving, and gender empowerment, etc.).

Why this paper?

Adapting to the fast pace of international development, PUM underwent a strategic transition to enhance the impact of the missions carried out by PUM's experts. To do so, we combine one-on-one missions with common objectives to create programmes and we participate in multi-partnership programmes by providing PUM's expertise.

Today, PUM has participated in several successful dairy programmes and is developing new dairy programmes with different stakeholders in the emerging economies such as Kenya, India, Bangladesh, Uganda, and Zimbabwe, etc. Based on these experiences, we would like to summarize our approach and share our lessons learned in this publication.

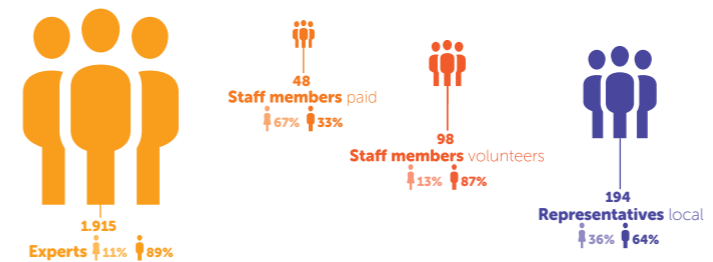


FACTS & FIGURES

PUM Netherlands senior experts

PEOPLE

TOTAL 2.252



CUSTOMERS

Small & Medium Enterprises

40 138



EXPERTISE

FOOD SECURITY



Food & Beverages Production



Agriculture & Horticulture



Animal Production, Beerkeeping and Fisheries



Chemical & Synthetic Materials



Textile & Leather



Metal Industry



Building & Construction



Trade

HEALTH & ENVIRONMENT



Energy, Water, Waste & Environment/CSR



Healthcare



Tourism & Hospitality



Business Consultancy



Vocational education & Training



Other

INDUSTRY & TRADE

COUNTRIES



PUM's Dairy Sector

MISSIONS CARRIED OUT BY PUM IN THE GLOBAL DAIRY SECTOR (2010 - 17)

LATIN AMERICA, MIDDLE EAST & EUROPE



493

AFRICA



282

ASIA

287



number of CUSTOMERS 76



Dairy sector development in emerging economies

Recent trends

The global dairy sector is undergoing a series of changes – decreasing demand from China, trade embargo to Russia, and the removal of EU milk quotas. These changes have among others led to a drop in the global milk market prices (Deloitte, 2017). Nevertheless, according to Rabobank dairy quarterly Q2 (2018), the slowing down in milk production in combination with rising populations and changing diets (especially in emerging economies) lead to a rebound of the milk prices. The increasing demand for dairy products has challenged the global dairy sector.

Why focusing on dairy sector in emerging economies?

Dairy farming is an important rural activity in emerging economies. It supports livelihoods and serves a multifunctional purpose. It generates food and income. Dairy cattle are also valuable assets, serving as a store of wealth, collateral for credit and safety net during times of crisis. Moreover, dairy products are key to nutrition and health. The dairy sector is one of the fastest growing sectors in the emerging economies. The growth and transformation of the sector is a powerful drive for agricultural development, achieving food security and nutrition, and poverty reduction.

Today, the emerging economies possess about 75% of the world's dairy cattle. They have the fastest growing dairy markets. Meanwhile, the development of the dairy sectors faces constraints such as lack of skills and management capacity, low productivity, low quality of inputs such as fodder, low quality of products, low investment (lack of access to finance), land dispute, lack of market access, and high greenhouse gas emission, etc. (Van der Lee et. al., 2014). Improving sustainable dairy production should therefore focus on the dairy sectors in the emerging economies to reach the increasing demand.

PUM's contribution to the dairy sector

The transition of PUM has led to several fruitful collaborations. In this publication, three examples are briefly described as a snapshot of what PUM has contributed to the global dairy sector.

Example 1: SNV Kenya Market-led Dairy Programme (KMDP)

The contribution of Kenya's dairy industry to its national economy should not be neglected. It contributes not only to the livelihoods of people engaged throughout the value chain but also to the nutritional well-being of many rural communities. The high potential dairy areas in Kenya are concentrated in the highlands (1,400 meters and above). The growth of the Kenyan dairy industry is mostly led by the private sector.

At present, the main challenges for the Kenyan dairy industry are low skills and knowledge level of farmers; seasonality of milk production due to lack of feed conservation; high costs of milk collection; poor milk hygiene and inadequate input suppliers and service providers.

The Kenya Market-led Dairy Programme (KMDP) led by SNV in Kenya aims at contributing to the development of the dairy sector with beneficiaries across the value chain. The second phase of the programme focusses on intensified practical training, extension and development of commercial farm advisory services; animal nutrition, fodder production and conservation, stimulation of chain integration and improve linkages with international (Dutch) companies and organisations.

PUM is one of the partners and shares with SNV a common vision to support the development of a largely private sector driven dairy sector in Kenya, by enhancing the capacity of dairy farmers, cooperatives and milk processors, as well as SMEs engaged in input supply and service provision thereby enhancing profitability, income, and employment.

The role of PUM in the programme is to:

- Provide training to private dairy advisors who support smallholders, medium and large scale farmers with setting examples and demonstrating good animal husbandry practices, including farm economics, fodder production and preservation, and feed rationing.
- Provide training to "champions" in dairy farm and fodder management to become "role models" for the sector.
- Provide advice to KMDP clients such as dairy cooperatives, farmer associations, milk processors, input suppliers and service providers to assure the local ownership and the weaning-off from KMDP.
- Build the capacity of KMDP's implementation team (local dairy advisors) and enhance their international exposure to dairy companies in the Netherlands.

PUM's achievements within KMDP:

- PUM has achieved influential impact on farm fodder production, feed conservation, animal nutrition, all resulting in increased milk production and profitability. PUM has provided dairy farm management advice to medium scale dairy farmers and the extension officers of the dairy cooperatives (who would further provide advice to small scale farmers).
- PUM plays an important role in linking up KMDP's clients with the Dutch private sector, through the existing networks of PUM's experts and the organisation of the business-link activity. In May 2018, PUM brought 8 local dairy advisors to the Netherlands for the business-link activity. During the 7 days' intensive programme, the KMDP team visited several Dutch companies and dairy farms. In the concluding evaluation session, lessons learned were drawn that were related to appropriate "best dairy practices" in Kenya would be and how to best equip Kenyan dairy advisors. It was a great learning opportunity for the KMDP team and the business-link activity has been very effective in achieving its goal.
- It is clear that PUM not only contributes

to the operationalization of the medium scale farmers' and commercial fodder producers' agenda through on-site technical advice and training in Kenya, but has also been instrumental in shaping the strategy of this agenda and the business to business agenda.

Example 2: Indo Dutch Centre of Excellence in Dairying - INDUCED

The Indian dairy sector faces constraints such as:

- Low milk production due to lack of technical skills of the farmers, especially concerning feeding and reproduction.
- Poor milk quality due to poor milking technique, lack of quality standards, inadequate transport and cooling facilities.

Tasty Dairy Specialities Limited (TDS) is a family owned dairy processing firm located in Kanpur, India. TDS would like to become a market leader, set benchmarks in quality, and achieve food safety of the dairy products. Moreover, TDS's vision is to contribute to the economic well-being of the dairy farmers in Kanpur. In order to reach its vision, TDS cooperates with PUM to set up an Indo Dutch Centre of Excellence in Dairying (INDUCED).

With PUM's support, INDUCED aims to increase the technical as well as the entrepreneurial knowledge of the dairy farmers in Kanpur so that they could produce more and cleaner milk, which would lead to a better income. The first phase of the programme lasts 28 months (1 Sept. 2017 – 31 Dec. 2019). PUM will provide trainings to about 50 medium sized dairy farmers and field workers (trainers). Furthermore, PUM will work closely with TDS to set up a demonstration farm that not only demonstrates but also provides trainings to farmers and field workers (trainers). The programme will also investigate the possibilities of improving the facilities for small farmers at the village level centres where milk is collected. Last but not least, PUM will provide trainings to the dairy plant to enhance its performances by increasing its efficiency and diversifying its dairy products.

At INDUCED, Dutch and local companies will establish sales and service centres. To this end, PUM has organized a business-link activity for the owner of TDS. During the business-link activity, the owner of TDS visited several Dutch companies that are specialized in milk cooling and processing equipment, production of concentrates, sales of semen and seeds, training in agriculture, and investment. An agreement with a company providing equipment has been achieved while with other enterprises negotiations continue.

Example 3: Training of trainers on Modern Dairy Farming, Dinajpur, Bangladesh

In Bangladesh, amongst rural households, over 70% own livestock, including the landless, marginal and small-scale farmers, many of them women. Their productivity and profitability remain unnecessarily low, failing to reach their potential due to low levels of knowledge on animal health, management of young stock and dairy cows, as well as milking techniques. Animal health plays a vital role in animal productivity, food security as well as food safety.

The faculty of veterinary and animal science of Hajee Mohammad Danesh Science and Technology University (HSTU) in Dinajpur focuses on promoting both public and animal health such as taking care of healthy and sick animals and prevention and treatment of diseases. Together with HSTU, PUM set up a programme to train the trainers on modern dairy farming in Dinajpur, Bangladesh.

The training of trainers (ToT) on Modern Dairy Farming programme aims at improving not only technical but also entrepreneurial skills and knowledge of dairy farmers, veterinary officers and teachers of HSTU (trainers). The ultimate goal is to improve the volume and the quality of the milk produced so that dairy farmers receive a better income. The programme lasts for 3 years (July 2017-June 2020). The first year of the programme will focus on:

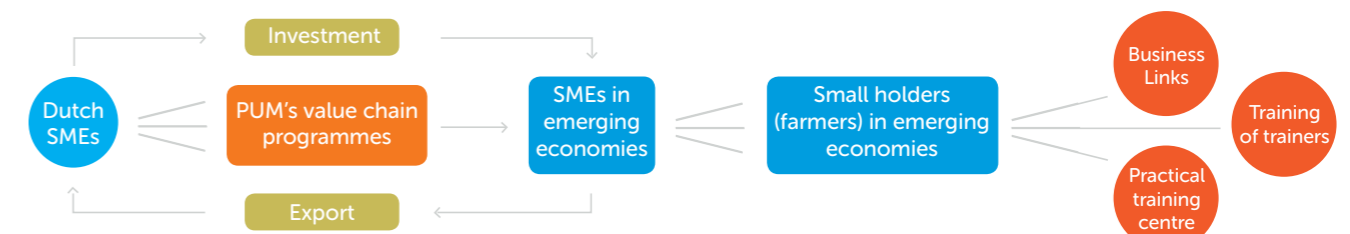
- Ruminant nutrition; roughage production, quantity and quality.

- Overall management of young stock and dairy cows.
- Milking techniques.
- Economics of dairy farm management and milk production.

The implementation plan is designed as such that the selected group of trainers is being trained in the first year on the above mentioned topics. It is expected that in the second and the third years, qualified trainers will be giving trainings to the farmers, veterinary officers and teachers of HSTU supported and coached by the experts from PUM. Meanwhile, an education curriculum will be developed in parallel to the training so that the faculty of veterinary and animal science is able to carry on the training themselves without the support from PUM.

PUM'S APPROACH

PUM's dairy programmes reach out to SMEs along the value chains in the emerging economies. Through these SMEs, our programmes successfully reach out to dairy farmers on a large scale. In this way, we strengthen the capacity building of the SMEs as well as the small holders by setting up self-sustainable practical training centres and demonstration farms, as well as providing training of trainers programmes. Moreover, the business link activities of PUM's programmes provide investment opportunities for the Dutch SMEs in emerging economies as well as export opportunities for SMEs in emerging economies.



Lessons learned

By transforming from implementing one-on-one missions to programs, our lessons learned are:

- PUM's approach is market-led and we work with SMEs and farmers who are willing and able to invest.
- Our value chain approach strengthens SMEs and small holders to reach impact.
- Business links: By creating linkages between SMEs in the Netherlands and the emerging economies, PUM not only transfer knowledge and skills, but also create opportunities for investment (for Dutch SMEs) as well as export (for SMEs in emerging economies). This consequently drives the sustainable development of the value chains in emerging economies.
- Local capacity building: By reaching out to a large number of small holders through SMEs and the organisations of SMEs, PUM's experts transfer tailored knowledge that is adapted to the local situation to the farmers. Such tailored knowledge ranges from technical skills to marketing and entrepreneurial skills.
- Training of trainers: By training the trainers and the extension officers, PUM strengthens the capacity of both private and public trainers to assure that technical messages are embedded in local structures and delivery mechanisms.
- Self-sustainable practical training centres: The practical training centre provides not only expertise but also a demonstration farm as a show model for the farmers. PUM helps to design the business model of such training centre to assure its self-sufficiency.



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dr. Le Chen is the leading author of this article. She would like to express her gratitude to Frans Ettema, Arend Jan Nell, Johan Koeslag, Andy Wehkamp, Pedro Eikelenboom, and Femme Riemersma for their support and comments.

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