KEY MESSAGES:
1. The collection and the intensification of dairy production in pastoral areas by Laiterie du Berger relies on the settlement of a dairy herd in the dry season, for each supplier farm.
2. Sedentarisation and intensification of dairy herd are only possible by complementation (forage and concentrates). This settlement of the family offers other opportunities for access to products and services.
3. The main herd maintains its transhumance, thus lightening the grazing pressure in the initial landscape.
4. Laiterie du Berger considers by 1 to 2 years it will have the ability to distribute sugar cane straw to all of its suppliers, thus lightening the grazing pressure in the initial landscape.
Laiterie du Berger. Milk collection in Ferlo grasslands (Senegal)

Overview of practice

The North of Senegal is characterized by low rainfall (<300 mm / year) and a long dry season (from November to June). In this area, the main production system is the Fulani pastoral production system. This system is mobile and extensive. Zebu, mainly Gobra breed, are raised for their meat on native rangeland. As the dry season advances, and pasture quality and quantity is reduced, herds and peoples go on transhumance towards the South. In this system, feed concentrate is commonly used at the end of the dry season to save weak animals.

It is in this Sahelian pastoral context that began in 2004 Laiterie du Berger (LDB) at Richard-Toll (North Ferlo, Senegal). LDB today collects milk from over 800 families twice a day. The major constraint is its seasonality. In the rainy season, the production is high allowing the collection of up to 6,000 liters per day. However, in the dry season, the volumes of milk drop to less than 1,000 l/d. LDB also seeks to increase collected volumes during the dry season. To assist in this, LDB has increased the following: the density of its collection network (map 1); the number of circuits, and the number of farm suppliers. It has also attempted to collect greater volumes from herders in the irrigated part of its impact zone, but other more lucrative sales channels for farmers has limited this collection to LDB.

In 2016, 85% of the collected milk still comes from the non-irrigated pastoral area. After increasing the number of farm suppliers, LDB is oriented towards an intensification of milk production by improving the low herds’ productivity in mobile and extensive systems, while trying to control the additional costs. The main lever is dry season feed supplementation: settlement of dairy cattle and distribution of concentrates and sugarcane straw.

Approach

It is a challenging logistic task to daily collect milk but also to supply dairy cows during the dry season.

To achieve this, the dairy and its partners encourage sedentarisation of a few cows in production, with their calves. On the other hand, the transhumance of most of the herd continues in the dry season. The challenge is therefore limited to how to feed cows (less than ten per farm) in the dry season in an environment almost devoid of natural pastures.

In the collection area, this translates into an increasing use of dry season supplementation: firstly by the agricultural by-products, coming from the nearby irrigated area and the massive use of sugarcane straws. Indeed, LDB signed a contract in 2016 with the main sugar factory in the region, located in Richard-Toll.
The distribution of forages and concentrates is also provided in three Centres de Services de Proximité (map 1) managed by farmers themselves. Twenty two centres are expected in 2017.

Map 1 : Location of collection circuits and Services Centers around Laiterie du Berger.

**Benefits of the Practice**

In the collection area, milk production has doubled in 10 years, since 2006. The dairy plans to double again its collection in the next ten years. This translates into an increase in earnings among farmers: milk now accounts for 25% of their total incomes that is still dominated by the sale of meat.

Sedentarisation of families, including women and children, provides access to the state’s services: hospitals and schools. Finally, on the environmental front, these new practices of complementing natural pasture with supplements in the dry season have a low environmental impact, in the long term, on the herbaceous stratum, while pastoral areas are now valued for not only meat production, but also for the production of milk.
Key Characteristics required for success

The key success lies firstly in the viability of the dairy. It certainly depends on its ability to register in the long term on the highly competitive market of Dakar. The speed of development of the company and the quality of its leaders seem to give serious guarantees.

Success also depends on the milk profitability for the families. This is of course a question of milk price but also of access to services. This access is particularly appreciated by families and women who spend less time in their moving to the markets, since the collection is done directly in the settlements.

It is then necessary to register in traditional practices, particularly in the maintenance of the mobility of most animals in the dry season, decreasing the pressure on native pastures.

The complementarity between irrigated areas (sugar cane and rice straws, agro-industrial by-products) and production of milk in pastoral areas have yet to be improved.

Finally, the governance of the Services Centers (via cooperative suppliers) will be a key point of success in the years to come.

The Good Practice Guidelines intend to provide practical operational information related to the Global Agenda for Sustainable Livestock Focus Area 2: Restoring Value to Grasslands. The information has been drawn from a global inventory of pilot sites connected to FA2. This guideline aligns with FA2 Themes 1 Enabling Institutions and 2 Resource Management.

Please visit www.livestockdialogue.org for more information.

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FURTHER READING

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