



PRESS RELEASE

CATTLE IDENTITY CARD ARRIVES: MORE YIELD AND SUPPORT FOR DAIRY FARMERS

Pro Caseus, how to make better cheese? A chip can tell you

Intermizoo, in collaboration with the University of Padova, patents a new index to measure milk quality starting from bulls

Padova, 11 March 2021_ Better milk in the barns and more cheese in the dairies is now possible thanks to **Pro Caseus**, a new tool to predict the cheese-making aptitude of a cow's milk with a **gene chip** patented by **Intermizoo** and the **University of Padova**. The Interregional Institute for the Improvement of Livestock presents a preview of the research carried out in partnership with Unipd, a contribution that will revolutionize the dairy world. By using the new Pro Caseus index Intermizoo estimates an **increase in cheese production up to 10%**. And the improvement is not only in quantity, but especially in **organoleptic and sensory quality**.

"**70% of milk** is transformed into **cheese** worldwide and **Italy** is among the **top 10 producing countries**. Hence the will to move away from the logic we have followed until now. And Pro Caseus represents a change of perspective. With this innovative tool, the producer, i.e. the dairy farmer, can finally think about the **destination of the milk: cheese**", explained **Francesco Cobalchini, general manager of Intermizoo**.

"This achievement," continued Cobalchini, "is the result of a great teamwork between the research world, Intermizoo and the farmers' organizations, started in **2007** with the first working project called "BullAbility" with the collaboration of the DAFNAE Department of the University of Padova to improve the efficiency of the entire dairy chain. The contribution of all those who dedicate themselves with passion every day to making our company grow and who have contributed to bringing Intermizoo to the 5 continents has been decisive".

"The Pro Caseus index is the result of the collaboration between the University of Padova and Intermizoo, **to assist Italian breeders**. Today Italian genetics has at its disposal an innovative and excellent tool aimed at improving cow's milk cheesemaking and able to ensure to **our country** the maintaining of its undisputed and worldwide renowned **leadership in the dairy industry**", said **Prof. Martino Cassandro, of the DAFNAE Department of the University of Padova**.

Pro Caseus measures the ability of the bull to produce daughters capable of producing milk that can be processed more efficiently into cheese. A discovery that **benefits end consumers, processors and farmers**. If you choose animals with a Pro Caseus index, you know that you are choosing animals selected for their strong cheese-making aptitude, animals producing **better milk**.

Milk destined to be processed into **high quality cheese should coagulate within a certain range of time**, related to the type of cheese being produced, and quickly form a **curd with a consistency suitable** for further processing. On the other hand, milk with a sub-optimal cheese-making aptitude, as well as having a

lower cheese yield, can affect the final quality of the cheese, its texture, the incidence of defects and rejects, **the processing time and cost**. The new Pro Caseus index allows farmers to improve the production of milk for processing, which in other words means more quantity, but also more quality with positive effects in terms of **sustainability for the entire supply chain**.

Cheese with Pro Caseus milk tastes better. Panel tests carried out on Pro Caseus cheeses have shown **better quality** than other types of cheese. Comparative sensory analyses were carried out on Asiago and Grana Padano cheese produced with the same processing and with **Holstein Friesian** cow milk. From the evaluations, the cheese with Intermizoo index was judged to be better to taste than the other sample: **more intense in color, smell and flavor**; less spicy, less sour, less crumbly and with less crystals. It does not have any overcooked or crusty smell. The other cheeses made from different milk were less intense and less complex in color, smell and flavor, being more acidic, bitter, firm, dry and with more crystals.

Cheese made from Pro Caseus milk yields more. Good milk offers **a good slice of extra income** by making the work of the dairy farmer and processor easier. Research has shown that each unit increase in coagulation time leads to a **loss of around 0.25 kg** of cheese from **100 kg of milk**. "A **reduced coagulation time** and a high clot strength make the curd and cheese texture **optimal**, avoiding abnormal microbial fermentation that causes negative repercussions on the texture and organoleptic characteristics of the cheese and, consequently, an impact on the commercial value of the product", explained Prof. Cassandro. Thanks to its improved coagulation characteristics, one liter of Pro Caseus milk can produce up to 10% more cheese.

Cheese with Pro Caseus milk is good for the environment. With 10% less milk needed to produce a wheel of cheese, **the health of the consumer** and the sustainability of the entire supply chain both will benefit, **as resources** such as water and soil **are used less** and **less milk is transported**. This is something to think about if we consider that, in the **last 40 years, world milk production has increased by 64%**.

Intermizoo, the Interregional Institute for the Improvement of Livestock, was established in **1974**. It selects, that is, it identifies the most suitable animals to produce the **Made in Italy excellence** that the whole world envies us. It works in contact with **breeders** and **operators in the dairy chain** to improve the animal population. Among the goals: increasing the longevity and fertility of cows, as well as the fertility of bulls semen. Improving **the quality of milk for dairy processing**, milk **protein variants** and **cheese-making aptitude**. Besides the Padova headquarter, it has a bovine semen production center in **Brussa di Caorle (VE)**, which has always been at the forefront of **animal welfare**. The barn consists of **208 bulls**, all of high and certified **genetic merit**. Every year **1,100,000 fertilizing semen doses** are distributed, half in Italy and half abroad.

Info: www.procaseus.com

Contacts

Press office e Media Relations - Studio Cloe'
Lina Pison Tel. + 39 346 66 58 851 - press@studiocloe.com - www.studiocloe.com

Istituto interregionale per il miglioramento del patrimonio zootecnico - Intermizoo S.p.A.
intermizoo@intermizoo.it - www.intermizoo.it