The Federal Office for Agriculture, Swiss Merino, Spycher-Handwerk, and Dashjoin Team up to Keep Swiss Wool Competitive

Around 1000 tons of raw wool are produced in Switzerland every year. The fineness is the most important characteristic for determining the price of the wool and whether it can be used for clothing at all. The finer the wool, the higher the price. Fineness, like other fiber traits, is inherited. Therefore, breed selection based on fiber analyses is crucial.

Assuming a breeding selection of animals with appropriate facilities, Europe is suitable for breeding animals with fine wool, for example sheep, cashmere goats, alpacas as well as Australia, South America or Mongolia.

The Federal Office for Agriculture funded a fiber analysis service. Swiss Merino, Spycher-Handwerk, and Dashjoin teamed up to cease this opportunity and strengthen Swiss agriculture by creating the first fully digital Swiss fiber lab. Breeders send samples to the fiber lab where optical sensors are used to capture hair diameter, curvature, crimp, length, and evenness. This data is uploaded to the fiber lab's cloud platform, where it is associated with the individual animal and processed statistically. Breeders and buyers can seamlessly connect to the platform using a PC or mobile device and get access to the relevant information instantly.

The resulting system is a resounding success story for all stakeholders. Breeders value the convenience of the fully automated data capture and processing. Finally, once data collection has grown over time, the Federal Office for Agriculture, the breeding associations, and farmers can make more informed decisions based on insights available from the fiber lab.

Cecile Aschwanden, initiator of the fiber lab, explains: "We are excited about this successful digital transformation project, but this is only the first step. We plan on further improving quality and animal welfare by extending the system to a digital breed registry that analyzes genetic presence and other parameters."

Patrik Grill, Managing Director of automateIT GmbH and technical architect of the fiber lab application, adds: "The flexibility of Dashjoin and the Low Code approach allows us to quickly cater to new requirements, for instance, customizing a report because an alpaca has a different fiber than a sheep. The deployment to the Dashjoin cloud including OpenID-based user authentication and row-based security was also a breeze."

For more information, please visit https://wooltest.ch/.