



LINEAPELLE

A sustainable future

The historic town of Santa Croce sull'Arno in Tuscany, Italy, is home to some of the world's leading exponents of sustainable and ethical tanning, many of whom will be attending Lineapelle and Simac Tanning Tech in Milan on 20–22 February. Andrea Guolo reports on some of the key environmental, technological and chemical trends impacting the industry.

“In China, in the last few years, 800 tanneries have been closed for environmental problems,” says Alessandro Francioni, a Tuscan tanner specialising in the transformation of shearling. “Meanwhile, the main Chinese leaders visited our tanning district because they needed to understand how it was possible to manage the activity in harmony with the environment. “In 2004, the Prime Minister Wen Jiabao arrived in Santa Croce sull'Arno, and the same happened five years after with the president of the Chinese People's Republic, Hu Jintao.”

The road to achieving environmentally friendly or 'green' tanning is a long one, but according to Francioni – who is also the

owner of the Sanlorenzo tannery and president of Assoconciatori, the association comprising the leather companies of Santa Croce sull'Arno – the journey along this road is complete in his country, Italy.

The district in Tuscany has been able to combine high-quality, large numbers and environmental protection. There are 250 tanneries and another 250 subcontractors in the Santa Croce area, employing a total of around 6,000 workers and with an average annual turnover of €2.4 billion. All this happens, not in a squalid suburb of a megalopolis where companies can operate with relative impunity, but between the hills of Florence and Pisa, an area synonymous worldwide with harmony with the landscape,

where grapes are grown to produce excellent wines and its cities attract millions of tourists.

A few kilometres from the tanneries, among the forests of San Miniato, hunters of the precious white truffle operate. This most noble of fungi (which fetched, in 2017, a year of scarce harvest, up to €6,000 a kilogram) thrives in this pollution-free environment.

Land and waste management

On the eve of Lineapelle and Simac Tanning Tech in Milan on 20–22 February, we focus on Tuscany to understand what tanners in probably the most advanced district in the world in terms of sustainability expect from the world's leading trade fair, not just for the presentation of fashion trends, but also in

terms of technology. The answer is simple: they expect to pick up knowledge that will allow them to follow market trends and customer needs, mainly related to fashion.

These requests relate to the company itself as well as to the logic of more robust land and waste management. Francioni cites another historical example.

"Those travelling on the highway from Florence to Bologna, passing the Apennines through the new mountain pass called Variante di Valico, know that at the base of that infrastructural work there is an inert material created using residues recovered from our production processes," he says. "We tanners are aware that 10 trucks of hide we buy corresponds to eight trucks of waste and only two trucks of finished product ... and knowing it, we organised ourselves to better manage all the problems and to do it all together. Today, we can break down 98.5% of the substances originating from the production cycle."

But the Tuscan tanners are not satisfied. They understand that there is only one way to win and that is to get ahead of others, to anticipate the competition. To do this, they need to understand where the market is going – and in Santa Croce sull'Arno this is simpler than elsewhere, because Tuscany is already home to top luxury brands.

Scandicci, the world's leading leather goods district, where all the big names in the leather bag industry operate – starting with Gucci, which was founded here – is 35km away, and the demand for these top brands is increasingly reliant on them fulfilling the need to be sustainable, ethical and green. Especially among new generations, who are highly sensitive to these issues, the prestige of a brand is linked to its ability to operate in a clear and transparent way, protecting the environment and the conditions in which its workers operate. Mistakes are not tolerated, because they often cause irremediable damage in terms of brand awareness.

Tuscan tanners raise the standards and aim to directly manage not only purification, but also problems related to by-products.

"It is no longer thinkable that the transformation of tanning mud into inert material is handled by outsiders, or that the same happens for shaving waste destined to become fertilisers for agricultural use," says Francioni. "If an improper use is made, the damage falls on us. For this reason, we want to take responsibility for the

management of waste, – even at the end of the cycle, recovering the processing scraps that derive from the skins during production – thus offering an additional service. We make a real circular economy and solve a not insignificant problem."

Forward thinking

In the era of Tanning Tech, there is almost obsessive attention paid to these issues. At the fair in Milan there will, of course, be space for the well-established market for traditional machines, for spare parts to be applied to dated solutions, to all that today inevitably belongs to the past. However, if we talk about the future, of the world to come, the direction is clear.

"There will always be more automation in the tannery, but this does not mean giving up the manual work because it is exactly through the craftsmanship that the tannery reaches an excellence that is irreplaceable elsewhere," says Roberto Lupi, owner with his brother Renzo of BCN, a tannery that specialises in veal skins destined for the biggest names in luxury.

"At the centre of technological innovation there are organisational aspects, management control, the efficient passage of data to monitor the various phases and intervene where something is not right. The challenge for our technology suppliers is to make high-precision machines that are simple to use, because everyone is able to build complicated machines.

"So I expect Simac Tanning Tech to find systems able to understand the characteristics of the single lot of skin put in the drum to optimise its performance and quality."

At BCN, a barcode system is adopted for the control of processing in wet phases.

"We absolutely need to collect data constantly because everything that creates problems upstream will be better managed downstream if we can understand where the problem exactly originated," explains Lupi. "For this now, from the wet phase, we want to extend it to the whole cycle, including finishing."

The metal-free debate

The same attention will be paid to the chemicals side. The transition towards metal-free tanning requested by luxury goods group Kering will require years of work to perfect the techniques and use the most effective substances.



Sustainability will be high on the agenda in Milan.

"We need to combine the demand for these new processes with results, because the resulting product must also be economically sustainable and must not create problems for the final consumer," underlines Maila Famiglietti – owner of Nuova Osba tannery, which handles calves for footwear and leather goods – highlighting the most evident quality issue: the decline in the quality of raw hides.

"We need more consistency of quality for what we buy, but we can no longer get it, even though the suppliers are still the same and mostly slaughterhouses are directly supplying the raw skins. The decline in quality is a general problem and, unfortunately, has also affected European hides and skins. It should be remedied in the process of tanning and finishing without over-covering the product, because then you lose the natural characteristics of the skin – and at that point customers prefer to choose other materials."

Roberto Lupi from BCN also considers the new challenge in terms of chemicals.

"If the luxury groups decide to go to metal-free, it is useless to make resistance because it creates a vortex from which you cannot go back," he says. "It is necessary, however, to understand, all together and with an open dialogue, the most effective ways to satisfy the requests, because today all the chemical suppliers have found a solution. But each one presents some criticalities that offer less guarantees of sustainability than chrome."

This promises to be a major talking point at this year's fair in Milan. ■