Optical illusion

Few things influence the sense of taste as much as sight. This is drastically demonstrated by wine, which tastes completely different in the dark.

By Patrick Bauer

Anyone who has participated at a wine tasting knows him – the greatest connoisseur of all times. Because unfortunately there's almost always one present.

That know-all who doesn't just have a sense of taste that plays in the Champions League, but also likes to demonstrate it to everyone. While others murmur uncertainly (and maybe also a bit embarrassed) things like "good", "tastes of wood" or "goes well with meat", the supposed connoisseur already claims to recognise the grape blend and alcohol content on the basis of the colour and legs. He smells and tastes slightly ripe blackcurrant, and even heather. Drones on about sun and terroir. And even finds a note of lychee in the most insignificant Gewürztraminer. "You can't taste it? No?"

No! But it's best not to pay heed to the connoisseur. Because tasting is complicated, it's a multisensory experience. Nose, tongue and palate naturally all play a role. But basically each of the senses influences our sense of taste and therefore each wine tasting is subjective.

Wine tastes better when the room is lit with red or blue light

The first impression of a wine is visual. What colour is it? Is it dull and cloudy or vivid and bright? Immediately the first expectations are disseminated. They may be confirmed or deluded, but they always determine whether we like a wine or not. French scientist Gil Morrot demonstrated this in a particularly drastic way, when he gave red wine to a number of oenology students. However they didn't know that: Morrot had mixed white wine with a tasteless colouring agent. During the evaluation test, none of the 54 (!) participants noticed the trick. The white wine was even attributed with typical aromas of a red wine. Also, psychologists from Mainz demonstrated that the colour of the light in an environment influences taste. Wine tasted better to participants when the room was lit with red or blue light, while white or green light made it seem worse.

As is easily comprehensible, in the world of wine blind tastings are used because the tasters must not be biased. Therefore the bottles are covered, the wine is poured into opaque glasses. But what happens when you drink wine and don't see anything at all? Fattoria "La Vialla" decided to find out. The wine estate near Florence works biodynamically and is one of the best-known culinary addresses in Tuscany. But some alleged connoisseurs would never drink their wine, on principle, because "La Vialla" only sells directly to its customers and at relatively low prices: the Chianti Superiore, for example, costs 6.35 Euro.

Recently "La Vialla" invited guests to a special blind tasting, to confront its wines with those of other important Tuscan wine estates. At the DialogMuseum, in Frankfurt, blind guides led the guests in a

restaurant in total darkness. During each of the five courses served, two wines were tasted and compared. There was no information given. No swilling it against the light, no analysis of colour or intensity, no labels. Nose and palate were the only instruments. Afterwards the wines were tasted for a second time. In the light and with labels. Two white wines that in the dark had shown completely different structures, for example, turned out both to be "Vernaccia" from the same price bracket. Also, in the dark, none of the tasters recognised that "I'Abbandonato" produced by "La Vialla" had challenged a competitor costing six times as much.

In the dark the sense of smell is not only more precise, but also more intense

This kind of blind tasting experience is only available in a few cities. But you can also do it at home. Turn the lights off, and your senses on. In the dark the sense of smell is not only more precise, but also more intense. Price, light and the wine's colour no longer count.

American neuroscientist Gordon Shepherd has analysed how flavours and aromas are processed in the brain. The sense of smell is closely linked to the brain's centre of emotions. This also explains the fact that aromas are capable of evoking strong memories. Shepherd's conclusion is: Man is an exceptional gourmet. Wine tasting is a highly complex process that involves more brain functions than any other activity. We are capable of recognising countless aromas, but what an individual tastes is extremely subjective.

Our brains all function in a similar way, but the detailed information processing differs from one person to another and also depends on the circumstances. Everyone enjoys a bottle of wine slightly differently. It's an excellent topic of conversation. But you should never argue. Because in the end everyone is right – and wrong.