Cinquième sens is a French perfume company, founded in 1976 by Monique Schlingen. They specialize in perfume creation, education related to the sense of smell for perfume description, organizing smell based events, advising companies, and providing olfactory expertise. The company works with famous perfume brands such as: Dior, L'Oreal, Chanel, etc., as well as coffee, olive oil, tea, chocolate, and liquor companies.

Isabelle Ferrand, director of cinquième sens is a biochemist. She worked with ORL to understand the physiology of an odorant.

MB: According to you, are there primary odors with which (as in color), it would be possible to recompose all the odors? If so, what are the primary odors categories?

IF: All of our raw materials are primary olfactory notes. Today we have at our disposal more than 3,000 raw materials that are natural flavors extracted from plants, molecules, or synthetic fragrances resynthesized. There are nowadays between 1500 and 2000 synthesized molecules.

For example, thanks to chromatography techniques, we know that rose essential oil contains more than 400 scent molecules and we know 80% of the composition of the scent of jasmine.

But to classify odors we mostly use olfactory families. At cinquième sens, we have a list of 18 words to describe flavors (ex. Woody, Chypre, Spicy, Animal, Fruity, Aromatic, green, navy, Eastern, etc.) and 25 to describe primary odors. For primary odors, we use a lexicon referring to specific fruits (ex. Lemon, Coconut, etc.) or to other senses.

MB: In what order is a perfume made? Should we start with the base notes to finish on the middle and top notes?

IF: We compose a fragrance in its entirety or by notes (base / middle / top). First, we should have a clear idea of the overall rendering. Then

we compose the formula as a recipe without necessarily thinking of its persistence or the temporality of its release. However, we use raw materials of different volatilities to ensure their persistence throughout the day and then create a scent trail.

The persistence of a perfume is the way the fragrance retains its smell throughout the day: first the top note, which will remain for about an hour, then the middle and back notes. Over time, the intensity decreases.

MB: What is the exact role of animal notes (musk, civet, ambergris, etc.) in a perfume? How do you explain these unpleasant odors becoming very common in a perfume mixture? Animal notes are known to give a deeper and sensual character to the fragrance, could it be the result of the presence of pheromones in these substances?

IF: The animal notes are used in homeopathic doses in perfumes, but they give the outfit and personality of the perfumes. They make perfumes live on the skin.

Musc: sent le bouc / la chèvre

Civette; urine, odeur fécale

Castoreum: cuir /peau

Ambre gris: tabac froid

There are other smells that may refer to organic smells, such as cumin, which smells like perspiration.

MB: How can we educate our nose?

IF: Through practice. Just as when we practice rehearse in music, the more we smell, the better we smell. A newborn does not have

preconceptions or bias and can smell many more odors than an uneducated adult nose. Adults are able to recognize about a hundred odors. It is a matter of education.

In perfumery, nobody is wrong, nobody is right.

We do not smell with the nose, but with our brain, that is why we must seek our own evocation, and our own emotions to have an infallible memory in odors recognition.

The olfactory mucosa enables odor recognition. In humans, it is located at the bottom of the nasal cavity and measures between 1 and 2 cm², while it measure 100 cm² in animals. On this mucosa, there are cilia that are used as odor receptors that send the olfactory information to the brain.

The peculiarity is that the olfactory messages go first through the hedonic center of the brain (center of emotions), before reaching the center of recognition. So when you can smell, we first judge it before recognizing it.

For all other senses, the brain first identifies the component before making a judgment of value.

MB: What vocabulary do you use to describe the smells and flavors you create? What type of image, metaphor or reference do you use to describe odors that do not have a proper name?

IF: With regard to the description of smells, it is not the vocabulary that is low, rather the lack of evocation behind the words. In addition to the vocabulary used to describe the twenty olfactory families, we could use the full dictionary to evoke smells, as it will look in the other senses. We can name a smell of a multitude of things: wooded, hairy, scaly, thick, fluid, etc.

But to ask a novice to describe one is easiest to do with a Chinese portrait: if it is a color, if it is a person, if it is a landscape, what would it be?