

Smelling in English: From perception to description

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Our sense of smell has long been characterized as the primitive, under-developed, and weakest of our five senses. Even Darwin considered it to offer only an “extremely slight service, if any” and its sole purpose is in triggering vivid memories that were once forgotten (1889:17–18). As such, smell has been comparatively under-researched. Linguists have shown the English olfactory lexicon to be impoverished (Winter, Perlman & Majid 2018), and that we very generally prefer source-based descriptions (Majid & Burenhult 2014), but from a cognitive linguistics perspective, much the discussion for the English language has ended there, despite an increase in recent research with minority languages that challenges the Eurocentric view of a ‘lower’ sense of smell in humans (see, for example, Majid et al. 2017; Floyd, San Roque & Majid 2018). It is yet unknown how speakers of languages without dedicated olfactory lexicon, such as English, compensate for this within the olfactory domain. For instance, we need to look at the olfactory equivalents of hue, saturation and brightness that we have for colour. Are all of the different salient dimensions of odour perception as equally impoverished as each other? Or, are particular dimensions, qualities, or properties more readily codable? This paper will address this question by reporting the results of two tasks by using a selection of 40 scents. The first task is an adaptation of the Successive Pile Sorting Task (see Boster 1994 for the original task; see Malt et al. 2011 for an example of an adaptation targeted towards linguistics). There 38 native English-speaking participants aged between 18 and 57 who judged each of the scents by placing them in sequentially smaller categories, based on their degree similarity. The results were analysed putting them into Multi-Dimensional Scaling solution – a technique that produced a two-dimensional olfactory ‘colour-wheel’. Distinct and salient qualities in perception are evidenced by a greater distance on the ‘smell-wheel’, compared to the similarities, which are demonstrated by adjacency. For example, Orange Blossom appears near Green Fig, as both are fresh scents, but both are distant from Dark Oud and Patchouli, quite heavy and woody scents. The second task is a description-based task employing the same stimuli where participants were asked to give verbal descriptions of each scent to reveal how participants are appealing to particular qualities and properties in their responses, and how they are doing so. By using these two tasks, we can explore how variation in the strategies of verbal expression correlate with the key perceptible differences in the conceptual space, such as pleasantness, familiarity, intensity, or freshness, when there is not a readily available lexicon to draw on.

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