



Day 1, Opening keynote: The conceit of Oracles

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Day 2, Opening keynote: The “race to embrace the senses” in marketing: An ethnographic perspective

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Pier 1 Imports is a store that specializes in home decor, including wood and wicker furniture, draperies, and scented candles. On the cover of its Fall 2000 catalogue there is a picture of a tabletop fountain made of slabs of brown and grey speckled marble. Down the right edge of the cover is a series of coloured boxes. Each box is imprinted with the name of a different sense. At the top is feel (golden yellow), then smell (lawn green), hear (purple) taste (lust red), and finally see (burnt orange). The slogan reads: “Get in touch with your senses™”

A full page advertisement for Westin Hotels & Resorts which appeared in 2007 features a bunch of lush green leaves spattered with dewdrops and the line: “White tea. The calming new scent of Westin.” There is a flap which releases the scent of white tea when opened. Just above the hotel logo is the slogan: “This is how it should feel.” The chain had recently introduced The Westin Heavenly Bed® with its “ten layers of pure comfort.”

When Apple launched the iPod touch in 2007 (or iTouch as it is also known), much emphasis was placed on the haptic interface of this combination music and movie player, game console and personal digital data assistant. “Touch your music, movies, and more,” the ads suggested, and: “Everything you touch is easy, intuitive, and fun.” This was all thanks to the “Revolutionary Multi-Touch interface.” There is no need to type commands or use a stylus since users can do everything they want with a simple motion of their fingers – tap, swipe, pinch, drag, flick.

Why all these invocations of the senses in contemporary advertising? Clearly, there is something stirring in the marketplace. Other examples include Salem’s “Stir the Senses”

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campaign, Friskies' "Feed their senses", Movenpick's "Amaze your senses" and the idea of Greece as a place to "Explore your senses". The list goes on.

Advertising guru and Saatchi & Saatchi Worldwide CEO Kevin Roberts speaks of "the race to embrace the senses" that has come over his profession (Roberts 2005: 106). Three books with the same title, "Sensory Marketing," appeared within months of each other in 2009-2010. What is it about the senses that so appeals to marketers and advertisers? What is driving all this hype? To answer this question I would like to offer an ethnography of "How Marketers Think." This title purposely reverses the direction of the gaze that informs the work of Harvard Business School professor emeritus and former director of the Mind of the Market Lab Gerald Zaltman in *How Customers Think*.¹ In Part I of this essay, by holding up a mirror, I expose how Zaltman and other business professors construct consumers' brains and senses based on a range of unexamined cultural assumptions. I also highlight the larger historical processes, such as the privatization of sensation, that can be seen as shaping the "mind of the marketer". In Part II, I examine the work of the "sensory professionals." These are the scientists responsible for testing the sensory design of products ranging from frozen food to automobiles before they go to market. In this part also, my concern is to expose the unquestioned assumptions that inform the "sensory evaluation" of consumer products and to point to some of the ways in which a culturally-informed anthropological (as distinct from the prevailing psychophysical) methodology would yield radically different insights and results.

PART I: HOW MARKETERS THINK

Let us call the advocates of sensory marketing "sense experts." One point they uniformly insist on is the newness of their approach. Thus, in *Sensory Marketing*, Swedish business professors Hultén, Brouwes and van Dijk (2009) speak of a "new epoch" dawning in which the senses will be the prime focus of marketing. (Formerly, marketing was all about the product or all about the service a company had to offer.) They go on to advise companies on how to develop strategies for each of the five senses so as to create the "supreme sensory experience" for their customers. The holism of this approach is touted as a way of clarifying a firm's identity and values and at the same time establishing a more individualized connection with the consumer on account of the subjectivity and emotionality of sense experience.

In the introduction to *Sensory Marketing*, University of Michigan marketing professor Aradhna Krishna starts by chiding her fellow professionals for having largely "missed the fact" that products are sensual in nature. She then advances the proposition that "the more firms can create, accentuate, or highlight the sensuality of their products, the more appealing these products can be for consumers" (Krishna 2010: 1) Next, Krishna discusses the recent history of product marketing. She distinguishes a series of periods leading up to the current time of the senses. First there was the 1940s through '60s, "post-Depression" or "non-nonsense" era. During this period, she writes, consumers "looked carefully at price and what the product offered". The sensory aspects of products were hardly mentioned, or "invisible." People lived frugally, opting for inexpensive items and lower-priced stores.

In the 1970s, Krishna continues, it was discovered that branded goods could command a premium, with Levis jeans being the prime example. The focus accordingly shifted to building brand names and logos. But, according to Krishna, the focus on name and logo distracted attention from the other aspects of products in the same way price did previously. As a result, the potential sense appeal of commodities remained occulted. Only recently, in the new millennium, have firms started “actively looking” at and seeking to emphasize the sensuality of products, while iconic brands like Tiffany (with its famous robin egg blue) or NBC (with its tri-tone chime) stand out precisely because of their “sensory signatures.”

Krishna notes that even the names of brands have become sensory in the new era of sensory marketing. For example, in the domain of food products there is “5 Gum” chewing gum. It purports to elicit all five senses, whence the name and the catchphrase: “5 Gum Food - Stimulate your senses.” In the domain of technical products, there is the iPod touch from Apple. Krishna underscores the way that, in the case of the iTouch:

the product name itself brought attention to a sensory aspect of the product and gave ownership to iTouch of that sense, the sense of ‘touch.’ The product name iTouch has connotations for the way the product feels when we use it and for the way it responds to our fingers. This was yet another prescient move made by Apple to play up the senses when few other competitors were doing so (Krishna 2010: 6)

Let us step back for a moment and consider how well-founded Krishna’s claims are. The first thing I would note about the iPod with its so-called multi-touch interface is that it is not about touch. It is about accessing sound (in the form of iTunes) and images (in the form of pictures or videos). It belittles touch because its screen, being made of glass, is devoid of texture.

There was a time, not long ago, when touch mattered to the operation of communication technologies. I refer to the days of the rotary dial phone. I happen to still have one such phone in my basement and bring it out every once in a while to practice dialing, even though it is not connected to any network. Dialing a “9” is different from dialing a “1.” It involves exertion. There is resistance. By contrast, the iPhone neuters resistance.

I do not own an iTouch or iPhone but I do have an iPad. Rather perplexingly, it does not always respond to my touch. I am told that this may be because the interface reacts not to touch but to temperature, and that perhaps the blood in my veins is too cold to activate the sensor. I do not appreciate being painted as a cold-blooded reptile, but this remains the most likely explanation, and I have found that rubbing my hands together vigorously before using my iPad definitely helps.

I suspect that I am not the only one who suffers from this particular “disability.” There could indeed be many people who feel excluded or deeply frustrated by the haptic interface. Hence, it worries me that Apple “owns” touch, as Krishna says, for that means the future is going to be very flat, however “intuitive”, and however “fun.”

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Setting my personal reservations aside, I have a number of more serious difficulties with Krishna's account of the birth of sensory marketing. Capitalism did not just discover the senses yesterday. The date is more like 1852, the year the first department store, Le Bon Marché, opened, in Paris (Miller 1981). That was the date that capitalism began to transform from a mode of production into a mode of presentation (Howes 2005). To elaborate, one of the distinguishing features of the department store was that each of its divisions or "departments" carried a different line of merchandise, from clothing to furniture to toys. This enabled customers to shop for many items under one roof, and at the same time it exposed them to many items they had not intended to buy but might be led to desire.

Second, the department store was a space of visual fascination with its palatial architecture and floor after floor of entrancing merchandise all laid out on tables. This open display of goods contrasted with the way goods had formerly been hidden away behind counters or in boxes, and the shopper had to ask a clerk to retrieve some item in order to inspect and possibly purchase it. In keeping with the new emphasis on ostentation, department stores like Bon Marché came to figure among the prime visual attractions of a city: they were places to see and be seen, as Rachel Bowlby brings out well in *Just Looking* (Bowlby 1985: see especially Figure 3)

Third, the department store allowed customers not only to look at but also to touch the merchandise - without the mediation of a salesperson. This increased the risk of theft and damage, to be sure, but that concern was offset by the notion that once a shopper had held an item in their hands, they would be more likely to want permanent possession of it. Thus, department stores were full of both eye-catching and hand-catching displays (Classen 2012: 191-7).

While the department store thus presented two kinds of inducement to buy, visual and tactile, it was the visual register that predominated. This occurred first in the form of the store window display that beckoned passersby to enter, second in the form of the posters and billboards that sought to attract the attention of more distant potential customers, and third in the form of the printed catalogues, some of which, like the Sears-Roebuck catalogue, even brought the store to the consumer.

There was, however, a problem with the hyperemphasis on the visual that distinguished the nascent consumer capitalist regime from its predecessor formation, industrial capitalism. (In industrial capitalism the accent was on disciplining the senses rather than pleasuring them, and production rather than presentation - see Howes 2003a: ch. 8). The problem was that as more and more of the visible surfaces of the city and countryside came to be colonized for advertising purposes, visual fatigue set in. Consumers' eyes glazed over due to the surfeit of visual stimuli. This raised the question: How do you catch the eye of the consumer when all your competitors are trying to do the same?



FIGURE 1. Competing for the Consumer's Gaze. "A Nation of Nations," 1976 Bicentennial Exhibition. Courtesy of Smithsonian Institution Collections, National Museum of American History, Behring Center.

The solution lay in multiplying the sensory bases of product differentiation. This principle was hit on accidentally by the Coca-Cola Company in 1916 (if one may believe the display on this topic in the Coca-Cola Museum in Atlanta, which I had the opportunity to visit recently). At the time, Coke came in straight-sided glass bottles much like those of all the other soft drink manufacturers. The only thing that distinguished a Coke bottle from, say, a Pepsi was the paper label. These labels had the annoying tendency of peeling off when the bottle was jammed in amongst other bottles in the dispenser boxes filled with melting ice. Coke therefore held a competition to design a distinctively shaped bottle that would enable customers to identify their product even if they could not see it when they reached into the icebox. Out of this competition came what is known as the "contour bottle," which is said to have been inspired by the curves and grooves of a cocoa bean. The inspiration may have been off (a cocoa bean rather than a cola bean – what were the designers thinking?) but the design caught on and became one of the most iconic shapes of the twentieth century. The Coca-Cola twin sphere bottle fits so snugly in the fold of one's hand that it is hard to resist reaching for one again and again and again. Coke patented the design, of course.

Adding feel was an important breakthrough as a means of product differentiation and persuasion (Howes 2005: 285-7). It was soon supplemented by adding sound. The first jingle was composed in 1926. It advertised the General Mills breakfast cereal known as Wheaties with the tune "Have you tried Wheaties?" Other famous jingles include Brylcreem's "A little dab'll do ya" and Coca-Cola's "I'd like to teach the world to sing" (or "It's the real thing"). Like the bottle that nestles in your hand these tunes nest in your ear, and have indeed been called "earworms" on account of the way they bore into your consciousness (Sacks 2007). Another 1920s start-up was the Wired Radio company (1922) which in the 1930s was renamed Muzak (a trademarked name, incidentally). It used the electrical grid to pipe program music into everything from malls and elevators to dentists' offices, and was

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supposed to be effective at modulating consumers' moods. "The right beat can turn browsers into buyers," one ad for the service claimed (Baumgarten 2012)

It took some time for the next sense to be added, smell. The scent strip was not invented till 1981, but then immediately took off. They were used extensively in magazines to advertise perfumes and colognes. As the technology for scent delivery has grown more sophisticated, scent-marketing has mushroomed into a billion dollar industry, with ScentAir leading the pack. Now, just as most commercial environments come with a signature soundtrack, so many commercial environments come fragranced: automobile showrooms, hotel lobbies (like Westin Hotels & Resorts with its signature white tea scent), casinos, and even sports stadiums.

And so was born what could be called the checklist approach to sensory branding, which was already becoming the new normal by the year 2000, as the Pier 1 Imports catalogue illustrates. (This move was first theorized by Pine and Gilmore 1998.) However, the new multisensual marketing strategy proved no less problematic than the hypervisual strategy that preceded it. The main problem is that if every company is pursuing this strategy, it is no longer so different, and thus fails to fulfil the goal of product differentiation. What do you do when you have used up all five senses (i.e. you have selected a signature colour, a signature sound, a signature scent, etc. for your brand) and all your competitors are doing the same (just with a different colour, different sound, different scent, etc.)?

One strategy is to outnumber your competitors by claiming that your product offers a sixth sense. This strategy has been tried by a surprisingly high number of automobile brands. A television commercial for the 2006 Hyundai Tucson sports utility vehicle had the following voiceover:

While the Hyundai Tucson is designed to excite all the senses, it also provides you with a 'sixth sense' in the form of electronic stability control: a safety feature that anticipates trouble, then, automatically intervenes, reducing the likelihood of a rollover. And it comes standard on every Tucson. The 2006 Hyundai Tucson: proof that, as senses go, you can never have too many.

A few years earlier, Toyota used the following line to promote the Lexus ES 300: "You Might Expect A Luxury Sedan To Cater to Your Senses. But All Six of Them?" In this case, the sixth sense was defined as "ergonomics: the uncanny ability of our cabin to have everything in exactly the place you would most likely want it" (see Howes 2005: 290). The latest automobile manufacturer to get on this bandwagon is Rolls-Royce, with its "Ghost Six Senses" model (see Howes and Classen 2014: 125).

Another strategy is simply to blitz the senses, to "stir" or "feed" or "amaze" the senses, as discussed previously. Glutting the senses in this way runs the risk of simply overwhelming the consumer's consciousness, however, as not only visual fatigue but sensory fatigue sets in.

Perhaps the biggest problem with the checklist approach, however, is that all of the most effective stimuli are steadily being privatized through trademark law. Initially it was only the brand name and logo of a company that could be trademarked, the idea being that this would prevent confusion in the marketplace (i.e. one company passing its goods off as those of another). Trademark protection was extended to colour first (it helped that Pantone

had devised a universal system for distinguishing and naming colours, making them easier to register), but then in the 1990s more and more sounds and scents and shapes, and even store layouts, came to be trademarked (providing they were sufficiently distinct) or patented. It was this development – the invention of property in sensation – that, more than any other factor, touched off the “race to embrace the senses” of recent years as companies scramble desperately to colonize the most sellable divisions of the sensorium in advance of their competitors. In other words, it is the creeping commodification of sensation, not the “discovery” that products are sensual in nature (as Krishna holds) that is the determining force behind the proliferation of appeals to the senses in the contemporary marketplace (Howes and Classen 2014: 114-8; Jones 2003).

This state of affairs begs the question of whether sensations should be considered property in the first place. I am reminded of a Peruvian folktale called “The Theft of Smell”. It tells of a stingy baker who takes his neighbour to court for “stealing” the smells wafting from his bakery. The judge rules that the neighbour should pay the baker - with the sound of clinking coins. This cautionary tale underscores the ludicrousness of the idea that there can be property in such an ephemeral trait as odour. Of course, it comes from outside the culture of capitalism. It is a peasant fable. It should nevertheless give us pause. Maybe the aggressive expansion of Western intellectual property law in recent decades, which has resulted in the “proPERTIZATION” of sensation, personas, and even life itself, is not so rational.² Maybe the culture is possessed, literally. Maybe we need to come to our senses, and fight this latest form of commodification, before we lose them (our senses) forever. Recall the complacent, and even celebratory tone with which Krishna hailed Apple’s recent acquisition of touch (thanks to the *iTouch*).

If we dig deeper into the ideology behind the current “race to embrace the senses” in marketing, we find that this movement is grounded in the idea that the senses can be used to bypass reason and appeal directly to the emotions (Malefyt and Morais 2012: ch. 5). The roots of this approach actually extend back to the rise of Behaviourism in the early twentieth century. Accounts of behavioural conditioning by psychologists encouraged marketers to think that they might make use of such conditioning for their own purposes (e.g. Sheldon and Arens 1932: 97-100). If dogs could be conditioned to salivate for food at the ringing of a bell, then could not customers be conditioned to “salivate” for a product at the sight of a logo? This approach presented people not as rational beings, but as creatures of habit and impulse who could be conditioned into certain responses. While within psychology the influence of Behaviourism declined in the later twentieth century, the possibilities it opened up of sensory and emotional conditioning continued to hold a huge attraction for marketers.

In recent years, Neuroscience has supplanted Behaviourism as the pet science of the marketing profession. In *How Customers Think*, for example, Gerald Zaltman writes that “95 percent of the decision-making process takes place below the conscious level” and that marketers must therefore aim their products and pitches at a sensory-emotional, rather than linguistic or logical level (2003: 1). Brain imaging is presented as offering an important new tool, or at least validation, for this approach. It is supposed to reveal the real seat of decision-making. As “brain scans suggest that only a small portion of the brain’s neural activity ultimately surfaces in language” (Zaltman 2003: 2), the conclusion is that an alternative to relying on language (i.e. advertising copy) to persuade customers must be

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found. The alternative that presents itself is sensory stimuli: sights, sounds, smells, touches, tastes. Whence the recent explosion in sensory marketing, which has been coterminous with the rise of the “experience economy.”

The “experience economy” (a term popularized by Pine and Gilmore 1998) is one in which, as far as marketers are concerned, product information and the making of rational purchase decisions should be the last thing on consumers’ minds – eclipsed (if not obliterated) by the impact of all the highly effective strategies of sensation management with which the “experience designer” structures a given product or environment. The emphasis in Pine and Gilmore’s treatise is on making an “experience” as memorable as possible through “engag[ing] all five senses” and that way dominating a customer’s recall (Pine and Gilmore 1998: 104). They hold up Disney as a prime purveyor of “experiences” as distinct from those companies that remain stuck in the old rut of simply selling products and services. Disney uses products as props and the provision of services as the stage for instilling “memories” that can last a lifetime. People pay for memories.

One finds a similar assault on memory being waged by Martin Lindstrom in *Brand Sense: Build Powerful Brands through Touch, Taste, Smell, Sight, and Sound*. According to Lindstrom, human beings come equipped with a “five-track sensory recorder”, and by our very nature “we’re at our most effective and receptive when operating on all five tracks.” The challenge facing companies now, if they wish to cut through advertising clutter (Goldman and Papson 1996), is to break out of the “two-track” or “2-D impasse” imposed by the prevailing audiovisual media and move towards “5-D branding”. This is because: “The more sensory touchpoints leveraged when building brands, the higher the number of sensory memories activated. The higher the number of sensory memories activated, the stronger the bonding between brand and consumer” (Lindstrom 2005: 69).

The ultimate goal behind all this sense-mongering, if we follow Lindstrom’s reasoning through to its conclusion, is for brands to inspire the same “irrational” fervour as religions. Religions “touch us at a fundamental emotional level, which precludes any rational discussion” (Lindstrom 2005: 169).³ Religions are able to do this, Lindstrom holds, because they have mastered the “Ten Rules of Sensory Branding”, which include using sensory stimuli (incense, chants, candles, wine, etc.) and rituals to build a strong sense of community amongst their adherents. Follow the same rules, Lindstrom advises marketers, and your customers can be touched at the same level.

In a similar vein, the “lovemarks” marketing concept publicized by Kevin Roberts (2005) proposes that the future of brands lies in shedding their function as trademarks, which elicit confidence by indicating a trustworthy source, and coming to function as “lovemarks” which, by mobilizing the emotions of the consumer, induce “loyalty beyond reason.” The way to accomplish this is through the senses. “Lead with your senses,” Roberts writes in his list of “Five things to do tomorrow”:

1. Approach everything you do with all five senses on high alert. If it doesn’t cuddle up to at least two or three of your senses, ask why not.
2. Come up with an idea for how each of the five senses connects with your brand. No cheating! Five senses, five ideas.... (Roberts 2005: 126).

In the final analysis, he suggests: “The only breakthroughs will only come with and/and. Taste and texture. Sight and sound. Taste and touch. Smell and taste” (Roberts 2005: 107). Check! Check! Check!

It is no accident that smell, taste and touch are the senses most in vogue in the current sensory marketing literature (as suggested by the order in which the senses are listed in the subtitle of Lindstrom’s book). They are, supposedly, the least rational - and therefore most susceptible to persuasion - of the senses. The fact that smell is described by scientists as conveying sensations directly to the deepest recesses of the brain with next to no intermediate processing makes this sense of particular interest. “Only two synapses separate the olfactory nerve from the amygdala ...” we are told by psychologist Rachel Herz (2010: 90). By associating products with distinctive odours, marketers hope to make them intensely and instantly memorable, increasing future sales. Hence the subtitle of the third in the recent spate of sensory marketing books: *Sensory Marketing: Smells Like Profits* (Solomon 2010).

The whole concept of the senses as “direct links” to the brain, which animates so much of the discourse of sensory marketing is, however, fundamentally flawed. Marketers are certainly correct in their acknowledgement of the impact of sensory messages. However, when they see the senses as “direct, provocative, immediate” (Roberts 2005:105), they fail to realize that they are adding an additional level of construction (and therefore mediation) to the senses with their marketing slogans and imagery. (By way of example, think of the trademarked phrase “Get in touch with your senses™” on the cover of the Pier 1 Imports catalogue, which legally prohibits copying.) This is similarly the case when marketers depict the senses as primal: “Our senses being primal,” Krishna (2010: 4) writes, “we react immediately and subconsciously to them, unlike to a brand name or an attribute, both of which are learned.” There is no recognition here of the fact that the senses are made, not given, or, in other words, that the senses have a history (Classen 1993, 2012; Howes and Classen 2014; Classen, Howes and Synnott 1994). Nor do marketers recognize their own wishful thinking - their dream of a “royal road” to consumers’ hearts and wallets - in their constructions of consumers’ senses and desires. Rather, to their way of thinking, it is all a happy matter of biology and evolution. Thus, Roberts writes:

The range of our senses is extraordinary. Thank evolution ... The world constantly changes. Who won the evolution game? ... Answer: The ones who responded fastest to the widest range of stimulation and information. ... The senses alert us, enflame us, warn us as well as fill our hearts with joy. They have protected and enriched us throughout our evolutionary story (Roberts 2005: 108)

Similarly ahistorical (putatively “evolutionary”) accounts of how the senses function can be found in such books as *The Evolutionary Bases of Consumption* (Saad 2007) and *The Consuming Instinct: What Juicy Burgers, Ferraris, Pornography and Gift-Giving Reveal About Human Nature* (Saad 2011). These books project the sexual and other impulses of the thoroughly modern (Western) male back on the caveman and purport to demonstrate how these “instincts” were “selected” by evolution.

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To discover that the senses of consumers are shaped by history and culture -- and not just by nature or "evolution" -- it is only necessary to look across cultures. When we do this we can find the same product with the same sensory attributes eliciting different responses from consumers with the same sensory faculties but different sensory associations and preferences. Take the example of India, a country with an enormous market for consumer products but with consumer preferences and associations that sometimes differ widely from those of Westerners. Cadbury, for instance, had to withdraw its dark chocolate offerings from the Indian market because their bitterness was unappealing in a country that likes its sweets to be very sweet. In another example of cultural differences in sensory inclinations, whereas in the West televisions are usually marketed on the basis of their picture quality, in India, where having a "big sound" is important, the electronics company Onida successfully promoted its televisions as offering superior audio capabilities (Kumar 2007).

Broader cultural associations also play an important role in marketing. Purity, which traditionally has very strong cultural and religious resonances in India is often emphasized in advertising, as conveyed by such slogans as "Purity in Each Drop", "for Every Mother Obsessed With Purity", "Pure Banking, Nothing Else" and "Purity-Sealed" (Cadbury chocolates). Tata brand salt, one of India's most trusted brands, gained its position through being marketed on the basis of its purity, a particularly apt association as salt has the symbolic significance of integrity in India (Shah and D'Souza 2009:371). It is clear from such examples that even such basic sensations as sweet and salty are mediated by culture and not simply straightforward sensory reactions (Howes 2003: ch. 8).

PART II: THE SENSES IN AND OUT OF THE LABORATORY

We have seen how Krishna's account of the birth of sensory marketing suffers from what historians call "presentism" (a common fallacy) and is oblivious to the impact of social forces, like the privatization of sensation, on marketplace dynamics. We have also seen how other sense experts, such as Roberts and Zaltman, are susceptible to what anthropologists call "naturalization" due to their fetishization of the asocial, ahistorical paradigms of Behaviourism and, more recently, Neuroscience.

To shift our focus somewhat, Krishna's account of the "discovery" of the sensuality of products also ignores the massive contribution made by all the men and women who, for decades, have toiled away in research laboratories testing the sensory characteristics of commodities. They are called "sensory professionals" and the senses are their stock in trade. The original name for this area of research was "organoleptics" and its origins, at least in the US, can be traced back to the 1940s and the wartime effort to provide acceptable food to American troops (Pangborn 1964). The title of "organoleptician" has since been dropped, replaced by "sensory professional." The sensory evaluation of food products remains central to their practice (which goes under the name of "sensory analysis" or "sensory studies") but the scope of the products that now fall within their purview has expanded significantly to include everything from personal care to household cleaning products, and home decor to automobiles. Sensory professionals have also lobbied hard to expand their role within the companies they work for, seeking to convince management that the application of sensory evaluation techniques is crucial to every stage of product development, from conception to

consumption. They like to use the language of driving, as in “sensory properties drive consumer acceptance and emotional benefits” (Kemp et al 2011), and it has had the desired effect.

The science of sensory evaluation rests on a fundamental paradox. On the one hand: “Most sensory characteristics of food can only be measured well, completely, and meaningfully by human subjects” as opposed to scientific instruments. On the other hand, it is considered important that human subjects behave as much like scientific instruments as possible: “When people are used as a measuring instrument, it is necessary to control all testing methods and conditions rigidly to overcome errors caused by psychological factors” (Poole et al. 1991: 1). In a similar vein, Morten Meilgaard et al (2010) affirm that the key to sensory analysis is to treat the panellists as measuring instruments. As such, they are highly variable and very prone to bias but they are the only instruments that will measure what we want to measure so we must minimize the variability and control the bias by making full use of the best existing techniques in psychology and psychophysics.

The controls in question include creating a sampling environment that is as sensorially neutral as possible with regard to such factors as temperature, colour, and odour, and ensuring that “irrelevant” sensory factors, such as the size of the samples, do not impinge on the evaluators’ judgement. Furthermore, assessors are trained to evaluate products “monadically” - that is, to assess one sensory characteristic at a time: the use of blindfolds, nose clips and “ear defenders” is advised to ensure that panelists maintain the desired focus (Kemp et al. 2011: 2.2.1.5 and 3.2), though a true professional should be able to dispense with such aids. Focus is also enhanced through isolating one assessor from another by having them perform their tasks in individual booths or cubicles (for illustrations of the design of such cubicles see Meilgaard et al 2010: 24-30). In addition, assessors are commonly instructed not to discuss samples before (or after) evaluation since this might create expectations, which are considered one of the most serious potential sources of error; and to work in silence, since “comments or noises made out loud e.g. urgh! or Mmmm! can influence sensory judgments” (Kemp 2011: 2.2.1.2). Panelists are otherwise instructed to disregard their “subjective associations” since the objective is to “provide precise, consistent, and standardized sensory measurements that can be reproduced” (Poole et al., 1991: 15).

There are basically three kinds of tests used in sensory evaluation experiments:

1. **Discriminative tests** (to determine whether or not a difference exists among samples);
2. **Descriptive tests** (to identify sensory characteristics that are important in a product and give information on the degree or intensity of those characteristics); and,
3. **Affective tests** (to measure how much an evaluator likes a product sample based on its sensory characteristics).

There is at least one kind of test missing from this repertoire, as we shall see presently.

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Finally, the variability of responses is controlled for through the use of standardized questionnaires and standard numerical scales (e.g. Stone et al 2012; Meilgaard et al 2010) as well as through statistical analysis of the results of the experiments, and the plotting of such results in the form of graphs and tables (see Figure 2). Only those results which are “statistically significant” are considered “meaningful.” In other words, while sensory evaluation experiments are concerned with assessing the qualities of products, it is the quantification of sensation that (really) counts. There are some cautionary voices: “Statistical analysis is not a substitute for thinking” (Groopman quoted in Stone et al 2012: 2).⁵ But in the final analysis the interpretation of results boils down to tabulating responses and pinpointing averages so that any trace of the “subjective associations” of individual panelists can be eradicated from the over-all picture of a product’s characteristics.

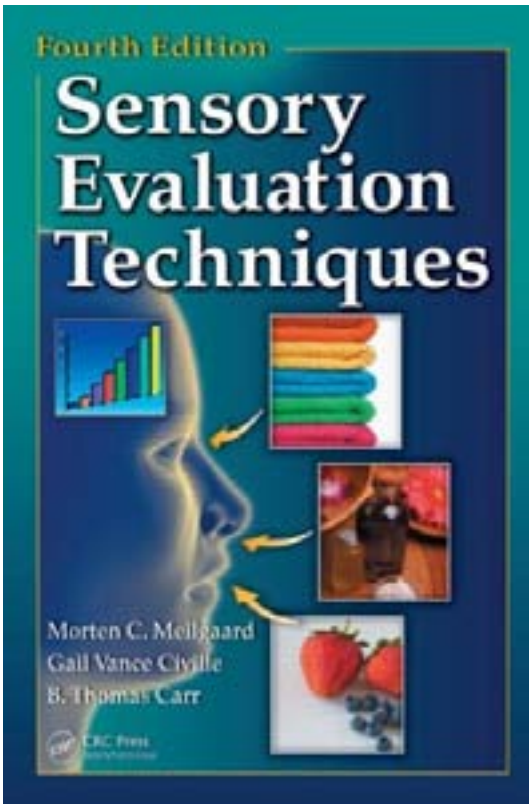


Figure 2. The Quantification of Sensation: Cover of *Sensory Evaluation Techniques* (Meilgaard et al 2010) showing the reduction of sense impressions to numerical graphic representations

To an observer, it might appear difficult to distinguish between the protocol of a sensory evaluation test and the protocol of the sensory deprivation experiments of the 1960s, since many of the controls are quite similar (see Zubek 1969). It is indeed remarkable the degree of sensory restriction to which the sensory professional is subjected in the interests of producing results that are “precise, consistent” and, above all, reproducible (Poole et al 1991).

Let me cite a case study published in a recent issue of the *Journal of Sensory Studies* that both aptly exemplifies the technique of sensory evaluation and, ironically, calls into question the results of virtually every study ever published in that journal. Researchers at the University of Mainz (Oberfeld et al 2009) found that the colour red suggests sweetness when they had participants taste white wine served in black glasses under different ambient lighting – red, blue, green or white. It was the same wine, but participants said it tasted 50 percent sweeter in red light compared with blue or white light. This study was unusual for the way it did not just focus on the product, the way most sensory studies do. It modelled an environment. And it did not just treat the senses additively (the way Roberts or Lindstrom would). Rather, it allowed that they might be interactive. In the result, it was found that the red ambient light, which was not a property of the product (the wine), but rather the environment, influenced the perception of the product’s flavour.⁶ Hence, the wine’s taste must be recognized as contingent on its context of consumption, but it is precisely context that the design of the sensory evaluation laboratory (except in the case of this study) is designed to rule out. Ergo all of the results ever published in the *Journal of Sensory Studies* are valid to the extent that the products concerned are consumed in the laboratories in which they were tested, but nowhere else. Now I ask you: who wants to drink wine alone in a booth in a sensory research laboratory?

It is difficult to imagine a more asocial or, practically speaking, more asensual environment and protocol than the environment and protocol of a sensory research laboratory. This is due to the assumption that, as Meilgaard et al. put it: “we must minimize the variability and control the bias [of assessors] by making full use of the best existing techniques in psychology and psychophysics.”

The Senses in Everyday Life

What if the methodology of some other discipline, besides psychology and psychophysics, such as anthropology, were incorporated into the practice of sensory evaluation? Anthropology has, in fact, begun to make inroads into the field due to the rise of the subdiscipline known as “sensory anthropology,”⁷ as exemplified by the work of Sarah Pink (2004, 2009), Timothy Malefyt (Malefyt and Morais 2012), John Sherry (2006), and the Concordia Sensoria Research Team (CONCERT), among others. The principles of this emergent mode of inquiry may be summarized as follows:

- Sensory anthropology takes the study of product perception out of the sensory research laboratory and into the street, the home, the bar or whatever the “natural environment” of the consumer may be;

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- It understands acts of perception to be cultural act as well as biological and psychological processes;
- Its methodology is one of participant sensation, or feeling along with one's informants, as opposed to subjecting them to some predetermined protocol and list of questions the way a sensory scientist would.
- The focus of sensory anthropology is on eliciting “the native's point of view,” or rather, because one doesn't want to privilege the visual over other senses, the native’s “ways of sensing” (Howes and Classen 2014) – that is, the practices (including technologies) which frame a given group's perception of the world, and the meanings with which those perceptions are imbued.
- "As we sense, we also make sense," in Phillip Vanini's felicitous expression (Vannini et al 2012). This formulation plays on the polysemy, or double meaning, of the word “sense.” This word includes both sensation and signification, both feeling and meaning in its spectrum of referents, which should be conceived as forming a continuum.

The polysemy of the word sense is lost on sensory scientists. The signifying (or “symbolic”) and also social dimensions of perception are occluded by their research protocols. By limiting the sorts of tests they use to the discriminative, the descriptive and the hedonic, they prevent themselves from ever investigating what could be called the semantics of perception. A semantic test, such as an anthropologist would be the first to utilize, would seek to “determine the meanings or mental associations stimulated by a given product's sensory characteristics” (Howes 2003b: 119).

In addition to highlighting the issue of sense-making, as will be discussed further below, research in the sensory anthropology of consumption has shown that consumers may be more or less discriminative in a particular sensory register, depending on how it is weighted or valued in their culture or subculture. By way of example, consider Sarah Pink's study of “the sensory home,” which was informed by the methodology of “sensory ethnography” (Pink 2009).

The Sensory Home

In this study, Pink (2004) compared attitudes toward household cleanliness and practices of housework in Spain and the UK. Her informants included students and retired people, as well as single and married women (or “housewives”) of middling age. She asked her informants to take her on a tour of their house or flat and recorded their actions and words on video. The tours typically involved poking her head in cupboards, and being invited to “smell this,” or “feel that,” in addition to conversing with her informants (thereby breaking the silence that normally prevails over the assessment of products in the sensory research laboratory).

For the Spanish subjects, dust referred to matter that had infiltrated the home from the outside world, and was classified as dirt to be eliminated. For the British subjects, dust referred to the flakings of persons and matter such as paint or plaster inside the home, and people were more tolerant of a certain build-up. It was not dirt as long as it did not smell. One young man stated that when the floor of his apartment started to feel sticky it was time for cleaning.

Pink found that the practice of cleaning house frequently involved people “dancing uninhibitedly” to their favourite music while wielding a broom or mop. Thus, housework had an audio component, a kinaesthetic component (which involved more than just scrubbing), and it also involved setting out scented products, like incense and essential oils as an enhancing touch. In other words, cleaning did not involve eliminating odours so much as enhancing the existing smell of the home. Significantly, Pink found that all of her informants compared themselves (often negatively) to what they suspected a “real housewife” would do, thereby incorporating a social dimension into what might otherwise be seen as a very private practice.

Pink’s study of “the sensory home” brings out how consumers do not necessarily use products “as directed” but rather “negotiate” social meanings through them and in so doing construct identities for themselves. Consumption is a creative process, Pink argues, wherein products do not “drive” or “trigger” responses in a straightforward fashion, but rather are selectively deployed to construct “worlds of sense” within which people can feel “at home.”

The Interplay of the Senses

As noted previously, sensory evaluation tests frequently involve the construction of barriers between people, between the senses, and between the “subjective associations” of the assessor and his or her response to the sensory characteristics of the product tested. This is accomplished through training and through the architecture of the sensory research laboratory with its individual booths. Assessors are instructed to discriminate, describe and express their preferences, but not associate. Do these firewalls work? They might seem to work in the context of the laboratory, though they would hardly work in everyday life, but even in the laboratory it is dubious that the play of associations between the senses can be forestalled. In one of the studies we reported on in *Aroma: the Cultural History of Smell* (Classen Howes and Synnott 1994) involving a test of facial tissues, it was discovered that respondents found pine-scented tissues to be “fresher” but also rougher than unscented facial tissues, even though there was no actual difference to the texture of the tissues used in the two samples. The reason should have been obvious: the respondents did not dissociate the scent of pine from the feel of pine needles, which are, of course, prickly. This is because “As we sense, we also make sense” (Vannini et al 2012).

In another study reported on in *Aroma*, respondents in a Chicago shopping mall were asked: What odour causes you to become nostalgic?

People born in the 1920s, ‘30s and ‘40s said that such odours as rose, burning leaves, hot chocolate, cut grass and ocean air made them feel nostalgic. Persons born during the 1960s and ‘70s, in contrast, grow nostalgic at such scents as Downy fabric softener, hair

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spray, Play-Doh, suntan oil, Cocoa Puffs, and candy cigarettes (Classen, Howes and Synnott 1994: 202-3)

The trending evidenced by this survey, when the responses are grouped by decade of birth, are significant: there has been a shift away from “natural” odours towards “artificial” ones, and many of the latter come already trademarked. This pattern brings out nicely the extent to which the sensorium is an historical formation:

It is not only in clothing and appearance, in outward form and emotional make-up that men are the product of history. Even the way they see and hear is inseparable from the social life-process The facts which our senses present to us are socially preformed in two ways: through the historical character of the object perceived and through the historical character of the perceiving organ (Horkheimer quoted in Levin 1997: 63 n. 1)

A study conducted a few years back by the Concordia Sensoria Research Team brings out further the sociality of sensation and the indissociability of the senses. We asked: What accounts for the popularity of Corona, the best-selling imported beer in Canada? Preliminary research suggested that part of the answer must have to do with gender. Men are, notoriously, far more avid drinkers of beer than women, and in the case of most brands the ratio is 5 male drinkers to one female drinker. In the case of Corona, however, the ratio is more like 3 to 2. This means that its popularity among women is key to its success. So we set out to investigate why women prefer Corona. Our quest took us to a range of bars and restaurants, many with a Mexican theme, where we talked with both men and women about their preferences. This displacement was essential, since in anthropology one wants to encounter subjects on their own ground and elicit the categories they use to order the world.

We did not go in with a predetermined set of questions. Instead we let the questions emerge in the course of interaction. Some subjects said that they had encountered Corona while on vacation in Mexico. For them, drinking Corona when back in Montreal was a way of injecting some festivity or “vacation spirit” into the drudgery of everyday life. More typically, however, those subjects who drank Corona regularly said they liked it because it is “light.”



FIGURE 3a. Corona



FIGURE 3b. Molson Canadian

Technically, Corona is not a “light beer.” It has the same alcohol content and carb levels as regular, domestic beers. This response, then, is an example of consumer-added meaning (and value). We needed to discover what motivated this categorization. What was it about the sensory characteristics of Corona that could explain this “misperception” (which is not a misperception at all, of course, from the native point of view)?

The design of the Corona bottle struck us as one of the factors contributing to the perception of the beer as “light.” Corona comes in tall, slender bottles that are clear and translucent. By contrast, most domestic beers, such as Molson Canadian, come in short, stubby, brown-coloured bottles (see figure 3 a) and 3 b) that even look more weighty, more dense than the former. Furthermore, the colour of Corona is light, like sunshine, compared to the golden colour of Molson. From our conversations with our research subjects, it appeared that they were condensing – or “associating” – a number of different sensations into one: the bright (or “light”) tint of the beer and the translucency (as well as slenderness) of the bottle was identified in their minds with lightness of taste (or, put another way, absence of heaviness). This impression was borne out by the gestures people used to describe their taste experience. When men talked about what they liked in a beer they would pat their stomachs whereas the women would rub their thumb and fingers together. The latter gesture suggested that what women most appreciate in a beer is a refined or delicate taste, whereas men are more interested in a full (and filling) flavour. Indeed, those men who preferred domestic beers claimed that Corona “has no taste” (by which they meant body) whereas those men who drank Corona with their female friends dissociated themselves from more “heavy drinkers,” as they styled their male counterparts.

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The Anti-Aesthetic of the Big Box Store

There is one last issue that calls for discussion here and that is the ambience of the big-box store. Its no-frills aesthetic seems to contradict everything that has been said about playing up sensuality in the new era of sensory marketing. When it comes to “sensory design” (Postrel 2003), the big-box store seems like a big black hole. This impression is, however, premature. The big-box store calls upon us to use our senses more discerningly, not less. By way of illustration, let me summarize the results of another CONSERT case study which involved comparing the ambience of a typical big box store with that of an equally typical high-end department store. As we shall see, the apparent anti-aesthetic of the big-box store is no less a sensory marketing strategy for being minimalist.

There is a notable difference to the location of the two establishments: the department store, in existence since 1866, is situated in the heart of the downtown, and is considered to be one of the city’s landmarks. The big-box store, which first opened in June 2000, is situated in a suburban shopping complex (and is only accessible by car).

The former presents a majestic stone façade inlaid with display windows which reflect the changing of the seasons. Every Christmas, for example, the idyllic scene of a miniature country village populated by furry mechanical bunnies and other creatures going about their daily round fills the front store windows. Passers-by cannot resist stopping to look and let themselves be charmed. The big-box store has no windows, only a cement and aluminium-sided storefront with a fake peaked roof and the store name in bold block letters. In its grey and blue-ness it resembles a battleship looming out of a sea of cars, as one informant put it, even if it is supposed to be reminiscent of the small-town storefront of old.

The interior lay-out of the two establishments also differs markedly, since the department store has seven levels, connected by elevators and escalators. Riding the escalator, being able to look down while ascending (effortlessly) on the moving stair, gives the shopper a sense of social mobility. By contrast, the big-box store is laid out on a single level as if to underscore the democratization of consumption which it makes possible, in contrast to the hierarchization of consumption (and society) at its upscale counterpart.

Huge chandeliers hang suspended from the ceiling of the grand magasin, which dazzle the eye. The shopper’s gaze is also diverted by the intricate, Baroque or Rococo-style plaster mouldings which festoon the ceiling. By contrast, the steel trusses and lattice-work that support the ceiling of the big box-store do little to arrest the eye, and by their very functionality direct the gaze back down and around instead of upwards.

The steel trusses have the additional function of housing the fluorescent lights, which illuminate the rows upon rows of 3-to-4 metre high shelving, in the same uniform “daylight”. At the grand magasin, the lighting, like the arrangement of the merchandise, is more variegated. Spotlights bathe select items in their own unique glow as opposed to a uniform glare.

On the topmost floor of the grand magasin, you sometimes see shoppers flounce on the beds and recline in the comfy chairs. At the big-box store, the furniture tends to be nailed to its perch and shoppers are left to infer the quality of a sidetable, for example, from the picture on the box it comes in (unassembled) or divine the softness of a duvet from poking a finger through the small hole in the plastic wrap. At the grand magasin, the merchandise

does not come packaged in plastic. It is laid out on shelves and tables. One shopper, pulling on a pair of gloves, remarked that it felt like putting one's hand in butter, the leather was so supple.

Apart from the dazzling lighting, the most salient sense impression to strike the shopper upon entering the grand magasin is the heady potpourri of expensive perfumes, which emanate from the cosmetics counters. In addition to being invited to sample the perfumes, female shoppers can have their colours read and their faces made up by the legions of attendants (all youthful, all dressed in black, all immaculately coiffed) who pack holsters full of lipstick, blush and eyeliner. Those women who take advantage of this "free trial" leave the store looking -- and feeling -- completely different from the way they felt upon going in.

There is no perfume counter at the big-box store, nor is there any discernible scent, and definitely no touching (except when shoppers accidentally run into each other with their overflowing shopping carts). However, there are many helpful sales associates on hand, as well as the ubiquitous greeters. The latter both welcomes and bids goodbye to the store's clientele, making sure that each shopper is equipped with a cart upon entry and does not set off any alarms upon exit.

Significantly, the corps of "sales associates" at the big box store includes people of all ages and ethnicities, and they wear everyday clothes under their blue aprons, so that they are not that differently attired from the clientele. In this way, the sales associates lend a common touch to the establishment, even though their job description prohibits them from touching.

The dominant soundmark at the big-box store is the non-stop beeping of the price scanners at the check-out counters, supplemented by the strains of a popular local radio station, regularly interrupted by storewide announcements summoning a sales associate to help some shopper or advertising an in-store bargain. The dominant soundtrack of the department store is a mix of preselected instrumental music (relaxing and uplifting at the same time), and every afternoon just before closing time a Scottish bagpiper parades from top to bottom filling the air with the skirl of his pipes. This nod to "tradition" (the store was founded by Scots) is complemented by the distinctive forest green, navy blue and yellow plaid boxes and bags which merchandise is wrapped in for taking home (unless a shopper would prefer a bag with a designer logo belonging to one of the boutiques). At the big box store, purchases are stuffed in grey plastic bags. Grey, by its very neutrality (being neither white nor black), signals the store's inclusivity in contrast to the exclusivity of the signature colours of the department store.

Conclusion

While in practice marketers have been experimenting with the senses for some time, it is only recently that the academic discipline of marketing has discovered the senses and the sensuality of products. Krishna was right in this regard (even though the reasons she gave were wrong). Other disciplines, such as history and anthropology, turned their attention on the sensorium some decades ago. This turn, which is now commonly referred to as the sensory turn, has generated a vast and varied literature on the senses as object of study and means of inquiry (see Howes 2013). In this essay, I have shown how the fledgling subdiscipline of sensory marketing could be expanded and enriched through taking

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cognizance of research in the history and anthropology of the senses. I have also exposed the pitfalls of relying too heavily on sensory psychology and psychophysics. It is hoped that this essay might stimulate more conversation, and in particular more critical conversation, between these subdisciplines.

ACKNOWLEDGEMENTS

I wish to thank Timothy Malefyt and Simon Roberts for inviting me to speak at EPIC 2013. I should note that this is not the same paper I presented at the Conference. It is twice as long, because I wanted to respond to the points and questions that emerged in the many deeply absorbing conversations I had with fellow conference-goers after the plenary. Part of the research on which this paper is based was conducted under the auspices of the “Multi-Sensory Marketing” research project directed by Dr. Bianca Grohmann of the Department of Marketing of the John Molson School of Business, and supported by a grant from the Social Sciences and Humanities Research Council of Canada. I wish to thank the Council, and the students who assisted in the data collection, as well as Bianca and Jean-Sébastien Marcoux of the Ecole des Hautes Etudes Commerciales, Montreal, for many illuminating discussions. An earlier version of a number of the arguments presented in the first part of this essay appeared in chapter 5 of *Ways of Sensing: Understanding the Senses in Society*, co-authored with Constance Classen, published by Routledge/Taylor & Francis.

NOTES

1. The title of Zaltman’s book perhaps unwittingly echoes the title of Lucien Levy-Bruhl’s classic *How Natives Think*. In this work Levy-Bruhl attributed a “pre-logical mentality” to “primitive” peoples. Levy-Bruhl’s theory was debunked within anthropology by E.E. Evans-Pritchard who, in his famous book on *Witchcraft, Oracles and Magic among the Azande* showed that the Azande were no less rational than Westerners, they simply started reasoning from different cultural premises, and by Claude Lévi-Strauss who, in *The Savage Mind*, introduced the notion of the “science of the concrete” to account for what was distinctive about the classificatory systems of traditional societies. As will be shown presently, Zaltman projects a subrational mentality onto the consumer, and views the senses as the fast-track to the consumers’ emotions. The burden of this essay is to show that consumers have more sense than business professors like Zaltman (or Krishna) allow.
2. On the properization of personas (celebrity personas), and life itself (as in the bizarre case of the patented Harvard “oncomouse”) see Sheryl Hamilton’s *Impersonations: Troubling the Person in Law and Culture*. On Latin American folklore as cultural critique see Michael Taussig’s analysis of the tale of the “baptism of bills” among the people of the Cauca Valley, Colombia (Taussig 1980). It is another cautionary tale for capitalists, inspired by the life experience of the

peasant, who understands commodities in terms of their use-value and is suspicious of the fetishization of exchange-value in capitalist economics.

3. This is a highly revealing construction of the meaning of religions and of marketing, since it presumes that in both cases the attachment is an irrational, sense-based one. Underlying this construction is the longstanding Western opposition between the intellect or mind, on the one hand, and the body and senses on the other. (Although traditionally religion would have been ranged on the side of the mind or spirit rather than the body.) It is ironic (and not a little pathetic) that, while contemporary branding appears to embrace the body and senses, it is actually more concerned with upholding and even strengthening the old mind/body split – that is, with separating the senses from the intellect and using them to tap the subconscious.
4. For a well-grounded, properly historical account of the changing role of the senses in the marketplace see Mack (2010, forthcoming) and Rappaport (forthcoming) as well as Classen (2012)
5. “Just because one obtains a graphical display or a series of tables with associated statistical significance does not mean it has any meaning or external validity” (Stone et al. 2012: 2). These are wise words, but, regrettably, Stone et al fall back on exactly the same range of tests and same kinds of statistical analysis as their fellow sensory professionals.
6. In the on-line summary of their conclusions, the authors of the Mainz study write:

Ambient lighting influences how wine tastes, even when it has no effect on the color of the wine in the glass. Our results show that the context has a stronger influence on the taste perception than formerly believed. These findings can be relevant for the architectural designing of restaurants and wine shops.

How can the effects of ambient color be explained?

The simple hypothesis that whenever a certain light color makes a person feel comfortable he or she likes the wine better could not be affirmed. The emotions elicited by a certain light color do not seem to be the cause of the effects. An alternative explanation could be an influence of color on cognition, for example by making us more accessible and responsive for a certain taste. Likewise, associations could play a role, e.g. “green = immature” [or “red = sweet”.] (Oberfeld-Twistel 2013).

The Mainz study departs from the vast majority of research in sensory evaluation by acknowledging the significance of context, recognizing the senses as interactive,

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and refusing to reduce the explanation of the observed effects to the mobilization of the emotions alone. Its focus on the interaction of the senses is particularly noteworthy. While this point has been one of the main tenets of research in the anthropology of the senses since the beginning (see Howes and Classen 1991: 258; Howes and Classen 2014: ch. 6; Howes 2013), it is due largely to the highly original and perspicacious work of the maverick experimental psychologist/”symbolist scientist” Charles Spence, of the Cross-Modal Research Lab at Oxford, that a focus on intersensoriality has begun to supplant the compartmentalized understanding of the sensorium that prevailed until recently in the brain and consumer sciences (see Howes 2011: 177-9; Spence 2005, 2007))

7. For an account of the development of the field of sensory anthropology see Howes 2003: chs. 1 and 2 and Howes 2013.

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Day 2, Closing keynote: Attaining humanity

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Day 3, Closing keynote: Magical thinking

GENEVIEVE BELL

Intel