



Sensory Processing Meets Inclusive Design

Creating Spaces That Think, Feel, and Care

Why is it important

Most environments are designed with a “one-size-fits-all” approach, overlooking the wide range of sensory needs people bring to work, school, or social settings. This lack of consideration for sensory diversity—how individuals respond differently to sound, light, textures, movement, smell, and visual input- can lead to discomfort, distraction, and disengagement.

When sensory needs are ignored, stress levels rise, focus drops, and the ability to participate meaningfully in daily activities is compromised. People may feel overwhelmed, exhausted, or excluded, undermining well-being, productivity, and a sense of belonging.

The solution lies in designing environments that recognise and respect these differences. Sensory-inclusive design adapts spaces to suit a broader range of sensory preferences, helping individuals feel more comfortable, calm, and connected.

At Sensory Intelligence®, we combine neuroscience with design to assess how people interact with space through their senses. Using individual sensory assessments and environmental audits, we deliver science-backed insights that improve comfort, reduce stress, and enhance functionality. Whether in the workplace, education, healthcare, hospitality, or at home, our approach creates environments where everyone can thrive.



What It Looks Like

- 1. Sensory audit™** (the space) is an on-site or virtual assessment using our proprietary sensory lens, including tailored recommendations across layout, lighting, acoustics, materials, and zoning
 - 2. Senses@Work™** (the person) end-user assessment to determine individual sensory needs
 - 3. Collaborative consulting** (the integration) with architects, interior designers, and health professionals
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1. On-site or virtual Sensory Audit™ (Space)

A [Sensory Audit™](#) is a structured, science-based assessment of how an environment supports—or hinders—human comfort, focus, and well-being through the lens of sensory processing.

We use a 50-point best practice checklist grounded in occupational therapy, sensory processing and neuroscience to assess the sensory properties of space, including:

- Visual input (lighting, colour, clutter, contrast)
- Auditory input (noise levels, echoes, background sound)
- Tactile surfaces (textures, materials, temperature)
- Movement and spatial flow (navigation, layout, zoning)
- Olfactory and air quality factors (scents, ventilation, freshness)

The Sensory Audit™ identifies what promotes calm, focus, and regulation, and flags what may trigger distraction, discomfort, or sensory overload. It includes sensory identifiers across three dimensions:

- Collective spaces: Shared areas such as lounges, reception areas, dining rooms, work zones, or lobbies
- Individual spaces: Private or semi-private rooms such as bedrooms, offices, deskspaces, or wellness rooms
- Well-being factors: Elements that influence health, restoration, and comfort (e.g., access to nature, sensory ergonomics, sensory zoning)

Each area is rated using our framework to determine if the space is supportive, neutral, or triggering from a sensory perspective.

The outcome is a clear and practical report with design, layout, and operational recommendations to make the environment more inclusive, productive, and human-centric.

2. Senses@Work™ (Person) end user assessment to determine individual sensory needs

[Senses@Work™](#) is our proprietary online assessment tool that measures an individual's unique sensory thresholds—how they respond to the everyday sensory input in their environment, such as light, sound, touch, movement, and visual detail.

Grounded in neuroscience and occupational therapy, it helps identify what each person needs more or less of to feel calm, focused, and productive in a given space. This is particularly useful for inclusive design projects that aim to meet real human needs, especially in settings where comfort, performance, and well-being are key outcomes.

How It Works

- A short, 60-question online assessment (±10 minutes to complete)
- Measures personal thresholds across the seven sensory systems: visual, auditory, tactile, olfactory, gustatory, movement (vestibular), body position (proprioception) and multisensory
- Each participant receives a personalised report with:
 - Their sensory thresholds (higher, neutral or lower thresholds)
 - Practical strategies to optimise comfort, attention, and regulation
 - Tips for adapting environments to meet their sensory needs
- In group settings, a combined team report is generated to map out collective sensory profiles, team dynamics, seating preferences, and simple environmental adaptations to support optimal performance and collaboration.

Why It Matters

Spaces impact people differently. One person might thrive in a quiet, low-stimulus space, while another might need movement and visual input to stay engaged. By identifying these individual sensory needs, Senses@Work™ supports evidence-based design, reduces overstimulation, and fosters truly inclusive environments—whether for a single user or an entire team.

3. Collaborative consulting

Where neuroscience meets design execution.

We work alongside architects, interior designers, project managers, and health professionals to translate sensory data into practical, buildable solutions.

This includes:

- Interpreting audit and assessment findings into clear design directives
- Advising on material selection, finishes, and sensory load management
- Supporting lighting, acoustic, and spatial zoning decisions
- Reviewing floor plans and layouts through a sensory performance lens
- Participating in design meetings to ensure sensory alignment throughout project phases
- Providing feedback during the procurement and specification stages
- Aligning health considerations with architectural intent
- Ensuring environments support both individual needs and collective functionality

Our role is not to replace design expertise but to enhance it with evidence-based human insight, ensuring spaces are not only beautiful and sustainable, but neurologically supportive.

Who Does It

- Licensed Sensory intelligence® Practitioners across the globe
- Dr Annemarie Lombard, Founder of Sensory Intelligence® Consulting
PhD in Occupational Therapy | Thought leader | 30+ years' experience | Author |
Global leader in sensory processing

Contact

- Dr Annemarie Lombard, Founder of Sensory Intelligence® Consulting
- lombard@sensoryintelligence.com
- 084 6611010