SOUND MASKING

For Commercial Offices

Research conducted over the last decade shows that poor acoustics is the *number one* cause of workplace dissatisfaction and the most significant factor affecting employee performance.

If you work in a modern office, you can likely relate. Despite today's emphasis on collaboration, usually you're spending time on work that requires concentration. Disruptive noises and conversations make tasks harder to complete. Errors happen more often. That adds to stress. And it takes more effort to focus, which tires you out, affecting your mood and, ultimately, your productivity.

It's not something to be taken lightly. A survey of 400 business managers conducted by BOMA and the University of Maryland identifies noise control as the greatest opportunity for productivity improvements. And, in an ASID study, more than 70 percent of respondents said they would be more productive if their office was quieter.

The Center for the Built Environment (CBE) also found a strong link between workplace satisfaction and speech privacy. Many employees are disturbed by coworkers talking on telephones or in surrounding areas. They're also concerned that others can overhear their own conversations. Often, maintaining their confidentiality is essential to your organization.
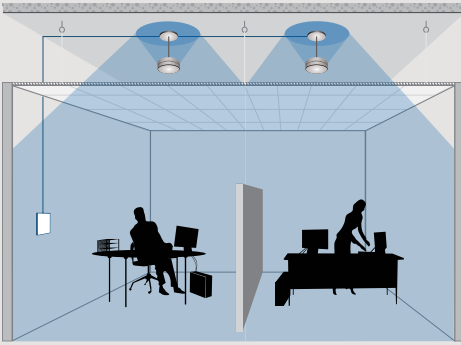
Are closed offices or meeting rooms the solution? It seems you get privacy, but in fact sound often leaks from one room to the next through the ceiling, penetrations in the walls' structure or air transfer components. In any case, most office employees spend the majority of their workday in open plans and, according to recent studies, 55 to 60 percent of their time on individual, focused tasks.

LogiSon®
ACOUSTIC NETWORK
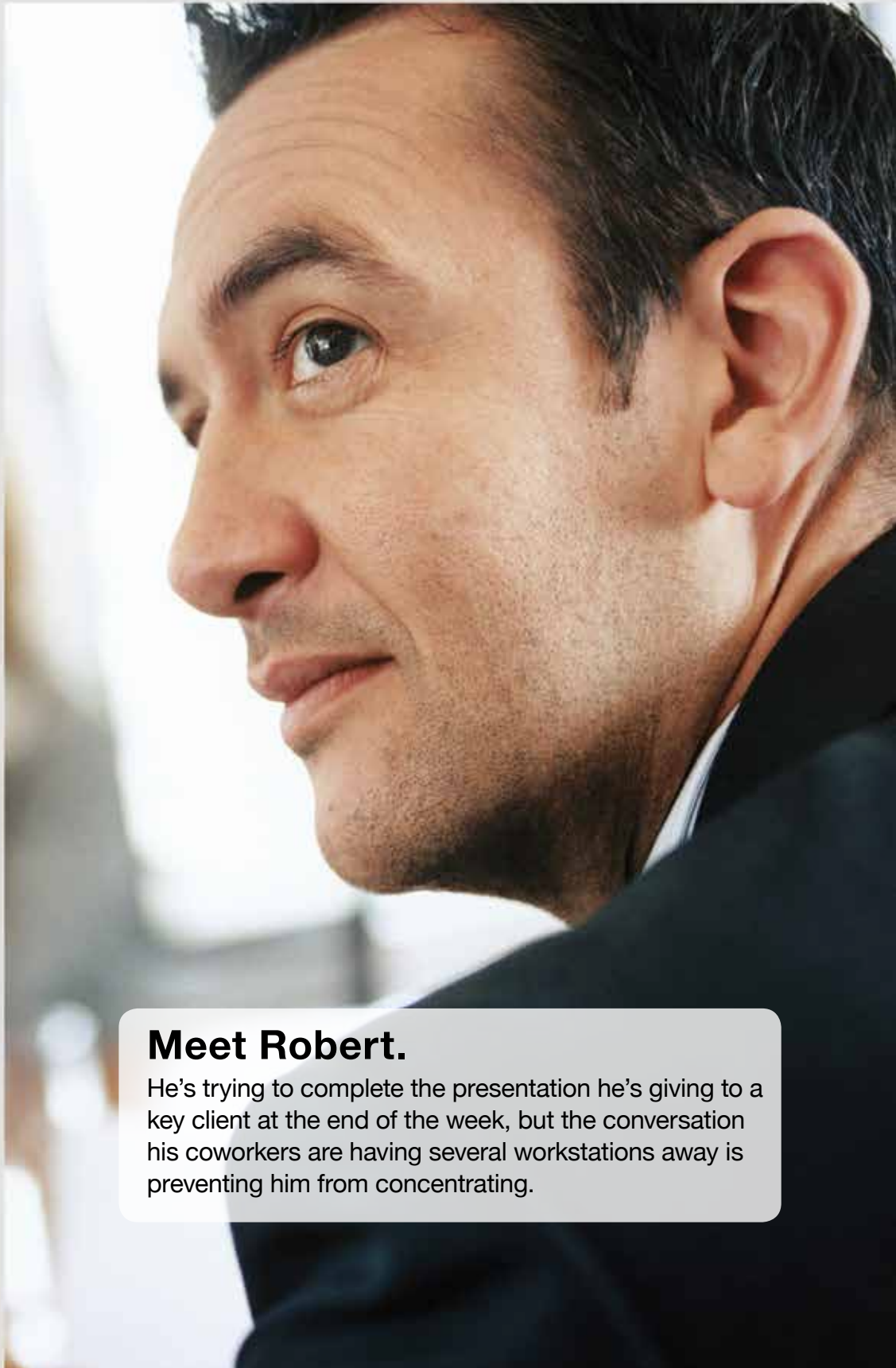
Meet Robert.

He's trying to complete the presentation he's giving to a key client at the end of the week, but the conversation his coworkers are having several workstations away is preventing him from concentrating.

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A FEW OF OUR COMMERICIAL OFFICE CLIENTS
• AC Nielsen • Deloitte • IBM • Microsoft
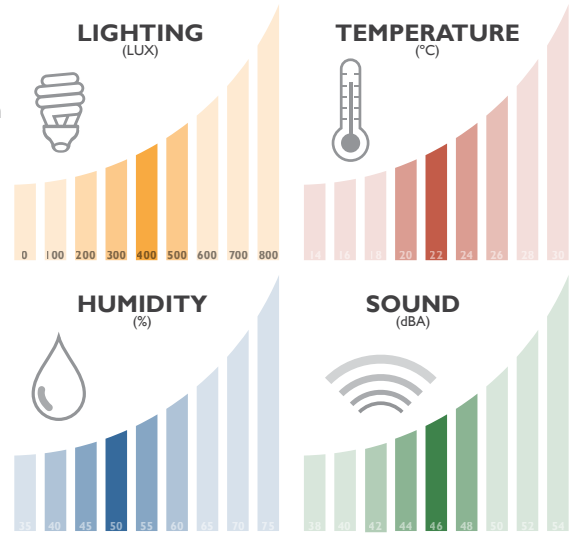• PricewaterhouseCoopers • Towers Watson

The Quest for Silence

Many pursue noise control strategies in the belief that effective acoustics will only be achieved when the sound levels in the space are as low as possible. However, just as with other ergonomic factors, such as lighting, temperature and humidity, there's a *comfort zone* for the volume of sound.

This comfort zone can be achieved by controlling the *noise floor*, which is the level of continuous sound that characterizes the space at any given time. If this floor is too low, speech and intermittent noises are easily heard and disruptive, even if they're relatively low in volume. The *noise floor* in offices is often so low that conversations are intelligible from up to 50 feet away.

Sound masking establishes and maintains a comfortable and effective level, which is usually between 42 and 48 dBA. This technology is vital to open plans. However, it's also needed in private offices and meeting rooms, because any gaps or penetrations can greatly affect the performance of even deck-to-deck construction, allowing conversations and noise to be heard both inside and outside the space. In fact, if the door is open, the occupant may have even less noise control than those in cubicles. To learn more, ask for our *Sound Masking in Closed Spaces* brochure.

LIGHTING (LUX)
0 100 200 300 400 500 600 700 800

TEMPERATURE (°C)
14 16 18 20 22 24 26 28 30

HUMIDITY (%)
35 40 45 50 55 60 65 70 75

SOUND (dBA)
38 40 42 44 46 48 50 52 54

The LogiSon® Solution

The LogiSon Acoustic Network distributes a soothing background sound throughout the facility. Though most compare this sound to softly blowing air, it's actually designed to mask the frequencies in speech, increasing privacy and reducing disruptions. It also covers up incidental noises that would otherwise impact comfort and concentration.

The system's loudspeakers are typically installed in a grid-like pattern above a suspended ceiling; however, they easily blend in with other exposed components in open applications. Small zones and fine control over both volume and frequency allow the masking sound to be customized to local conditions, ensuring that it's comfortable and effective across the entire space. And because control is networked, this level of performance is easy to maintain.

The system can also distribute paging and music. Its high level of component integration dramatically reduces the investment, energy and space requirements typically needed for audio equipment. Custom page zones can be created and changed on demand.

Benefits include:
• Improved noise control
• Increased speech privacy
• Improved productivity
• Paging and music functions
• Lower project costs
• Facility flexibility
• Quick ROI

This technology is easily retrofitted to existing spaces. For more information about the system's advanced features, see our brochure or contact your local LogiSon Representative.

Case Study

MMM GROUP • Thornhill, Ontario • Canada

Together with its subsidiaries/affiliates, MMM Group comprises a global firm with more than 50 offices in Canada and around the world. The company is an industry-leading program management, planning, engineering and geomatics firm, and a partner of choice for major design-build, P3 transportation and building projects in Canada, the U.S. (through Lochner MMM Group) and around the world. Its projects have achieved both public and critical acclaim.

Problem

Dan Butler, manager of security and IT with consulting engineering firm MMM Group, usually designs systems of these types for the firm's clients, but when MMM moved into a new mid-rise office tower in Thornhill, ON, the client was his own company. Occupying six floors within the nine-storey structure, MMM is targeting LEED®-CI (Commercial Interiors) Gold. Most employees previously had enclosed offices and now work in an open-plan setting.

Solution

Polished concrete floors and other hard surfaces throughout this office would have created an uncomfortably noisy acoustic environment, but Mr. Butler says that sound masking has successfully addressed the issue. Normally, the sound masking would be on its own network, but in this office everything from lighting to sound masking is integrated into an IP-based control network.