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Experiences: Audio in Multisensory Interactions: from Experiments to Experiences -- Immersion in Audiovisual Experiences -- Augmenting Sonic Experiences through Haptic Feedback -- From the Lab to the Stage: Practical Considerations on Designing Performances with Immersive Virtual Musical Instruments -- Index.

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Sommario/riassunto

This open access book tackles the design of 3D spatial interactions in an audio-centered and audio-first perspective, providing the fundamental notions related to the creation and evaluation of immersive sonic experiences. The key elements that enhance the sensation of place in a virtual environment (VE) are: Immersive audio: the computational aspects of the acoustical-space properties of Virtual Reality (VR) technologies Sonic interaction: the human-computer interplay through auditory feedback in VE VR systems: naturally support multimodal integration, impacting different application domains Sonic Interactions in Virtual Environments will feature state-of-the-art research on real-time auralization, sonic interaction design in VR, quality of the experience in multimodal scenarios, and applications. Contributors and editors include interdisciplinary experts from the fields of computer science, engineering, acoustics, psychology, design, humanities, and beyond. Their mission is to shape an emerging new field of study at the intersection of sonic interaction design and immersive media, embracing an archipelago of existing research spread in different audio communities and to increase among the VR communities, researchers, and practitioners, the awareness of the importance of sonic elements when designing immersive environments.

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