“A potential effect of vision on sound externalization and auditory distance perception?”

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This presentation will deal with auditory distance perception and the externalization of sound when it is reproduced with headphones. Different studies from the literature will be discussed and compared, along with new data on both distance and externalization. While the acoustical cues underlying distance perception in rooms and/or sound externalization using headphones will be considered first, a special emphasis will be put on binaural vs. monaural cues. After comparing studies leading to apparently very conflicting results, the potential difference between distance and virtual distance perceptions will be addressed, in particular their dependency on sound externalization and on having or not the eyes open while listening will be discussed.