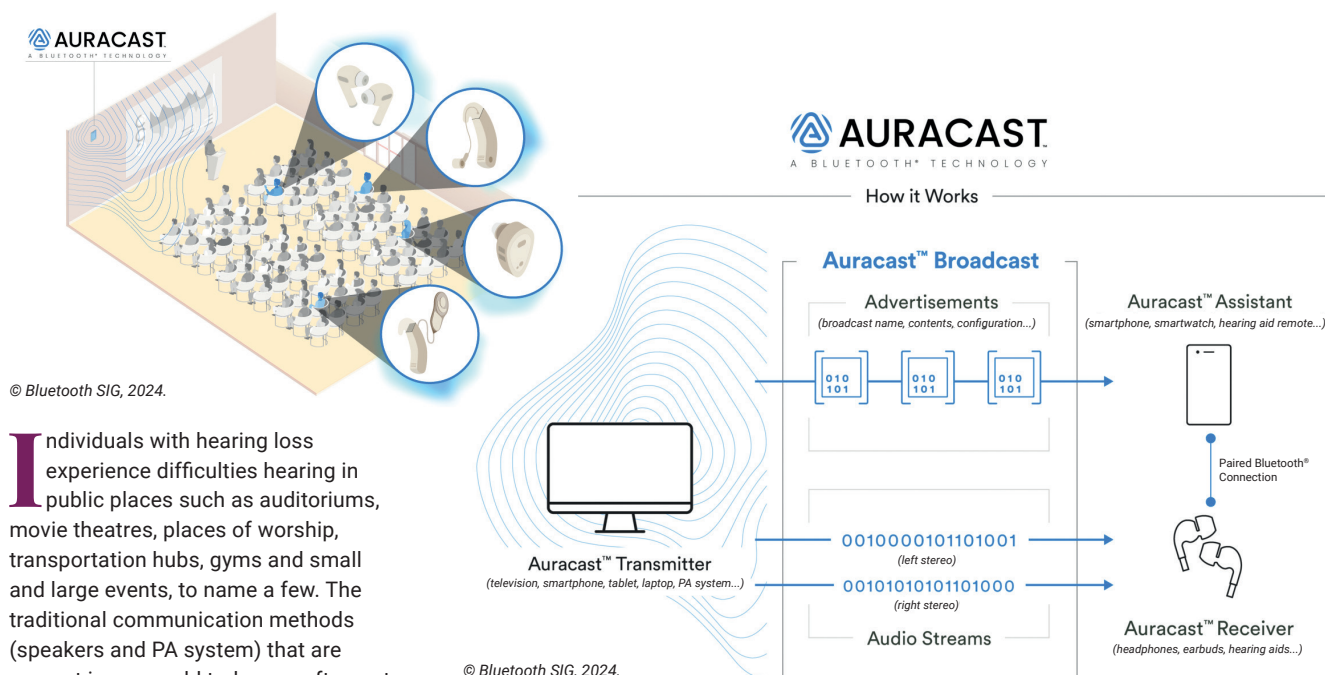


Auracast – a Bluetooth technology for hearing impaired individuals

BY FARAH ABDEL AZIZ AND EMMA LEBLANC



© Bluetooth SIG, 2024.

© Bluetooth SIG, 2024.

Individuals with hearing loss experience difficulties hearing in public places such as auditoriums, movie theatres, places of worship, transportation hubs, gyms and small and large events, to name a few. The traditional communication methods (speakers and PA system) that are present in our world today are often not loud enough or introduce distortion, leaving hearing-impaired individuals feeling disconnected and often isolated from the outside world. Auracast is the newest solution from Bluetooth Technology to help overcome these challenges. Auracast is an assistive listening system that provides direct audio to people with hearing aids and cochlear implants, and even those wearing earbuds.

Auracast was designed to allow an unlimited number of individuals with an Auracast device to connect to streaming audio. Traditional Bluetooth technology limits how many people can access audio at the same time. For example, a family with multiple individuals wearing hearing aids cannot all pair to the TV or cellphone to hear the streaming audio with traditional Bluetooth. However, Auracast technology introduces high-quality audio for everyone, whether they are wearing hearing aids, cochlear implants, headphones or earbuds. Imagine a world where both individuals with hearing aids and those with perfect hearing using earbuds can hear the same audio, clearly.

A transmitter, such as a television, smartphone or PA system, begins an Auracast broadcast that is recognised

by the individual's device (smartphone, smart watch, hearing aid remote, etc.). This broadcast shows up on these devices in a manner similar to what we see when we search for Wi-Fi. Once the user chooses the broadcast they want to tune in to, the Auracast receiver connects to the audio. This allows for an unlimited number of individuals accessing better audio, thereby increasing accessibility.

Auracast's wireless connectivity is one of its best features. No wires, special headsets or adaptors are needed to pair to the audio in large venues, unlike telecoil systems. Auracast offers a variety of adjustments in their settings, such as volume control, as well as special assistive features, such as live captioning. Auracast is accessible to a large variety of hearing aids, smartphones, headphones and earbuds, making it easier to connect to almost anything via Bluetooth.

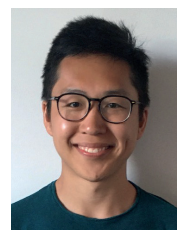
Auracast Bluetooth is a new and exciting piece of technology working with hearing impaired individuals to improve their quality of life. This technology will allow for a positive transformation in the hearing aid industry and will break the barriers that are present between our real world and the digital/technological world.

AUTHOR



Farah Abdel Aziz,
Vestibular Technician,
Centre for Advanced
Hearing and Balance
Testing, Toronto General
Hospital, Canada.

SECTION EDITORS



Jonathan Lee,
ST3, MRCS, Department
of Ear, Nose and Throat
Surgery, Warwick Hospital,
University Hospitals of
South Warwickshire NHS
Foundation Trust, UK.



Emma LeBlanc, AuD,
Clinical Audiologist;
Lecturer, University of
Toronto, Department of
Otolaryngology – Head
and Neck Surgery, Toronto
General Hospital, University
Health Network, Toronto,
Canada.
emma.leblanc@uhn.ca