

Pure tone audiometry (PTA)

The key [hearing test](#) used to identify hearing threshold levels of an individual, enabling determination of the degree, type and configuration of a hearing loss. Thus, providing the basis for diagnosis and management.

PTA is a subjective, behavioural measurement of hearing threshold, as it relies on patient response to pure tone stimuli. Therefore, PTA is used on adults and children old enough to cooperate with the test procedure. As with most clinical tests, calibration of the test environment, the equipment and the stimuli to ISO standards is needed before testing proceeds. PTA only measures thresholds, rather than other aspects of hearing such as sound localization. However, there are benefits of using PTA over other forms of hearing test, such as click auditory brainstem response. PTA provides ear specific thresholds, and uses frequency specific pure tones to give place specific responses, so that the configuration of a hearing loss can be identified. As PTA uses both air and bone conduction audiometry, the type of loss can also be identified via the air-bone gap. Although PTA has many clinical benefits, it is not perfect at identifying all losses, such as 'dead regions'. Moore BCJ. Dead Regions in the Cochlea: Diagnosis, Perceptual Consequences, and Implications for the Fitting of hearing aids. Trends Amplif. 2001;5:1-34. This raises the question of whether or not audiograms accurately predict someone's perceived degree of disability.

From:

<https://neurosurgerywiki.com/wiki/> - **Neurosurgery Wiki**

Permanent link:

https://neurosurgerywiki.com/wiki/doku.php?id=pure_tone_audiometry

Last update: **2024/06/07 02:59**

