VESTIBULAR MIGRAINE vs MENIERE'S DISEASE. DIFFERENTIAL DIAGNOSIS

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Introduction. Differential diagnosis (DD) between Vestibular migraine (VM) and Meniere's disease (MD) is challenging because both conditions present with recurrent episodes of vertigo. Correct differentiation is essential due to differences in pathophysiology, prognosis, and treatment strategies.
Materials and Methods. A systematic literature review (2020–2026) was performed using PubMed, Scopus, and Web of Science, including original studies, reviews, and clinical guidelines on diagnostic criteria, pathophysiology, and treatment of VM and MD.
Results. MD is a peripheral vestibular disorder associated with endolymphatic hydrops, characterized by excessive accumulation of endolymph in the membranous labyrinth. Clinically, MD presents with recurrent rotational vertigo accompanied by progressive sensorineural hearing loss, tinnitus, and aural fullness. Episodes usually last from 20 minutes to several hours and are often associated with nausea and vomiting. Hearing loss fluctuates at the early stage, mainly affecting low frequencies, and gradually progresses. The disease often begins unilaterally and may later involve the opposite ear. VM is the most common cause of recurrent spontaneous vertigo of central origin. Attacks last from minutes to hours and are often associated with migraine features such as headache, photophobia, phonophobia, or visual aura, although headache may be absent. Persistent hearing loss is uncommon, and audiometry is usually normal. Vestibular symptoms may be positional and triggered by stress, sleep deprivation, or dietary factors. Progressive cochlear symptoms favor MD, whereas migraine features without auditory deficit suggest VM. Acute MD attacks are treated with vestibular suppressants and antiemetics, while long-term therapy includes salt restriction, betahistine, and diuretics; refractory cases may require surgery. VM treatment follows migraine therapy principles: NSAIDs, triptans, benzodiazepines, or dihydroergotamine are used during attacks, while prophylaxis includes beta-blockers, antidepressants, calcium channel blockers, acetazolamide, and antiepileptic drugs.
Conclusions. DD should be based on clinical characteristics of vertigo, presence of progressive hearing loss, and audiometric findings. Repeated audiometry and modern diagnostic criteria improve accuracy and allow appropriate treatment selection.
Keywords. Vestibular migraine, Endolymphatic hydrops, Meniere's disease, Headache