

2025 Annual Convention You Belong Here! Sharing Our Similarities, Celebrating Our Differences!

The World Does Not Revolve Around You! You're Just Dizzy!

presented by:

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#SCSHA2025

The World Does Not Revolve Around You!

You're Just Dizzy!

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Beach Audiology Hearing & Balance Center



Materials for presentation



Slide Deck



Examples of Balance Patient Intake Forms

Jason Wigand, AuD, CCC-A

Financial disclosures:

Owner & Chief Audiologist
 Beach Audiology Hearing & Balance Center - Myrtle Beach, SC

Non-financial disclosures:

- Treasurer, South Carolina Academy of Audiology
- Board Member, Board of Examiners for Speech Pathology and Audiology –
 South Carolina Department of Labor, Licensing and Regulation (LLR)
- Board Member, National Council of State Boards of Examiners for Speech Pathology and Audiology
- State Champion Advocate (SC), American Cochlear Implant Alliance
- Board Member, Alexander Graham Bell Association, SC Chapter



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Financial disclosures:

Clinical Audiologist/Vestibular Specialist
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Non-financial disclosures:

None





Beach Audiology Hearing & Balance Center

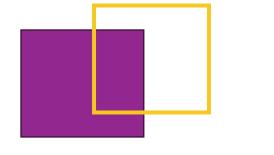
We are proud to be certified as a Center of Specialty
Care by the American Institute of Balance!
The Institute is widely recognized for providing
practitioners with the most current clinical and
scientific breakthroughs in treatments.

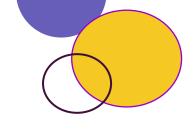




Did you know?

•Dizziness is the number one complaint reported to medical providers in adults 70 years of age or older.



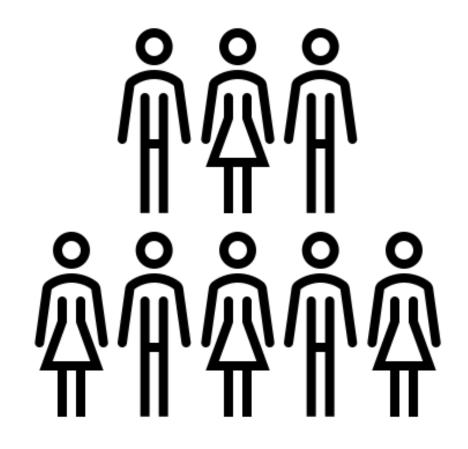




Balance-related falls cause over 300,000 hip fractures in individuals over 65 years of age.

It affects millions...

•According the National Institute of Health (NIH), dizziness or loss of balance will affect 90 million Americans sometime during their lifetime.





•Problems with equilibrium may indicate serious health risks or limit a person's everyday living.

Vertigo is most common in people with cardiovascular issues, diabetes, or history of migraines.



What's The Difference?

Vertigo

- Swaying/Rotating
- True spinning sensation
- The world or yourself are spinning



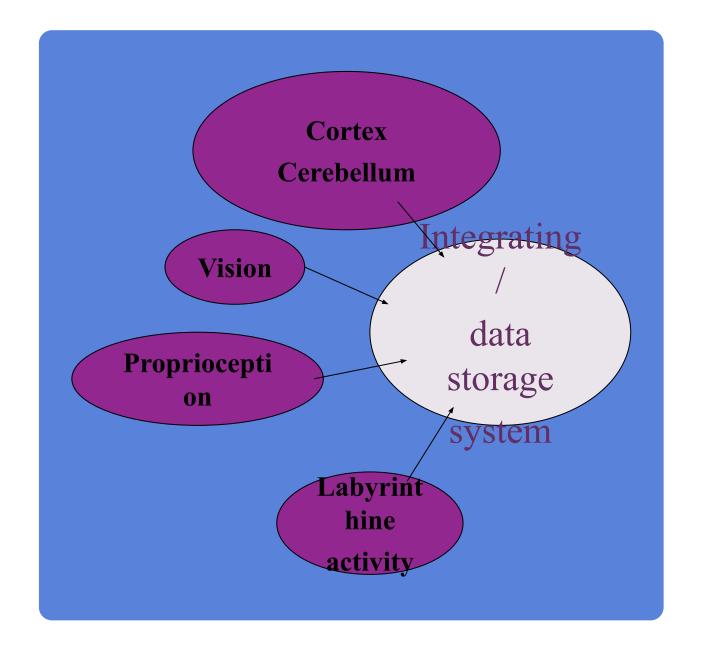
Dizziness

- Lightheadedness
- Unsteadiness
- Feeling like you're going to faint

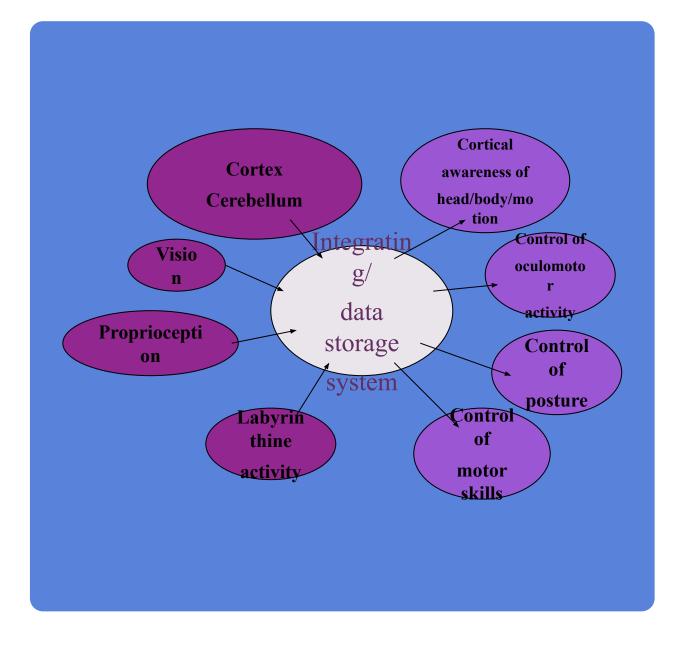
Let's start with some definitions...

- Vertigo
 - A specific illusion or hallucination of movement, usually rotatory
- Dizziness
 - Light-headedness, faintness, giddiness, swimming/floating feelings, imbalance, ataxia, minor episodes of mental confusion

Balance - Input



Balance -Output

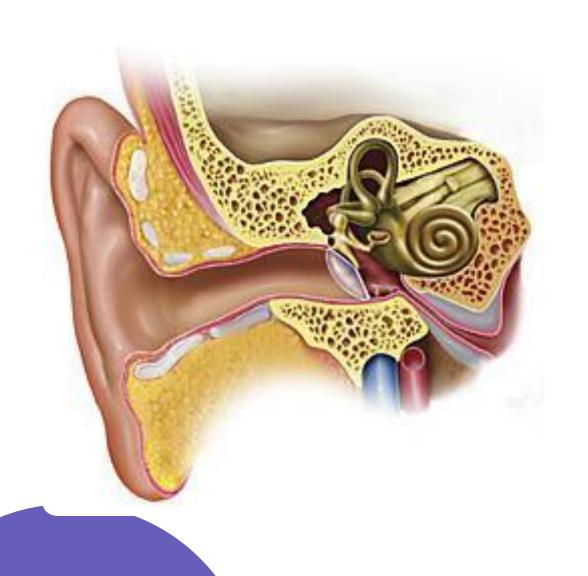


CASE HISTORY:

THE most important part!!!!

Diagnosis

- Differential diagnosis
 - Vestibular (peripheral)?
 - Neurological (central)?
 - General medical / systemic?
- Vertigo ~ peripheral vestibular disorder
- 'Dizziness' ~ general medical disorder
- TRY. TO. SPECIFY!

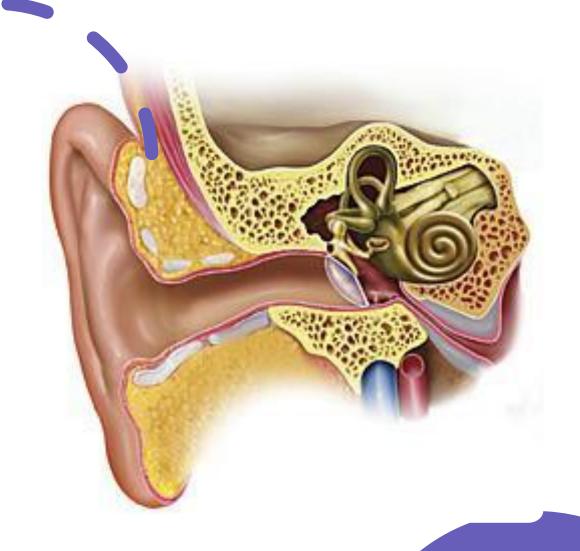


Otologic causes

- Inner ear inflammation ('labyrinthitis' or 'vestibular neuronitis'
- Vascular disease (labyrinthine end artery)
- Meniere's disease
- BPPV
- Vestibular schwannoma

Otologic causes

- Vestibular neuronitis:
 - Sudden onset acute vertigo lasting several days, all positions
 - Slow central compensation (weeks)
 - Longer if vestibular sedatives used
 - May be left with peripheral hypofunction
 - Tendency to relapse in years to come



Vestibular Neuronitis



Acute episode of vertigo lasting days then slow resolution as central systems compensate for any persistent loss of vestibular function

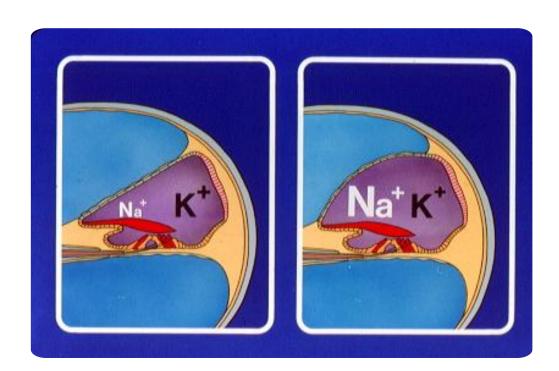


If associated with hearing loss, implies it was a true labyrinthitis i.e. damage to entire labyrinth, including cochlea (possible auditory deficit)

BPPV

- Short-lived rotatory vertigo related to certain head positions
- Diagnosed by Dix-Hallpike test
- Attacks often precipitated by rolling over in bed
- Treated by Epley maneuver





Meniere's disease

- Rare
- Trifecta of
 - fluctuating hearing loss
 - Tinnitus
 - vertiginous attacks (< 12 hrs)
- With time, hearing loss persists and vertigo attacks subside
- May be left with chronic vestibular failure



- •Treatment:
 - Diet
 - Lasix/water pills
 - •Intratympanic gentamicin
 - Rarely, surgery

Otologic causes

- Ototoxicity
 - Antibiotics: Aminoglycosides (streptomycin, gentamicin - which is more vestibulo- than cochleo-toxic)
 - Cytotoxics: Cisplatin, vancomycin
 - Diuretics
 - Salicylates/NSAIDs, (in high dose are cochleotoxic, not vestibulotoxic)



Cerebrovascular disease

Migraine

Neurological causes



Basal ganglia disorders

Parkinson's Alzheimer's (late in disease)



Brainstem disease

General medical causes



Cardiovascular

e.g. hypo/hypertension, dysrhythmias, anemia



e.g. hypothyroidism, Chronic Renal Failure

ASSESSMENT

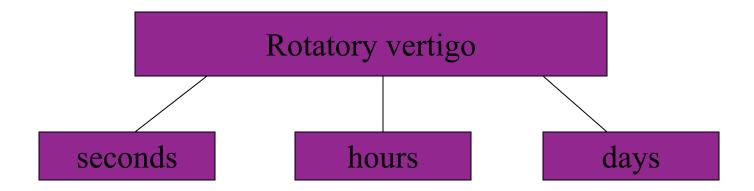
- Examination
 - General medical assessment
 - Neurological assessment
 - ENT assessment

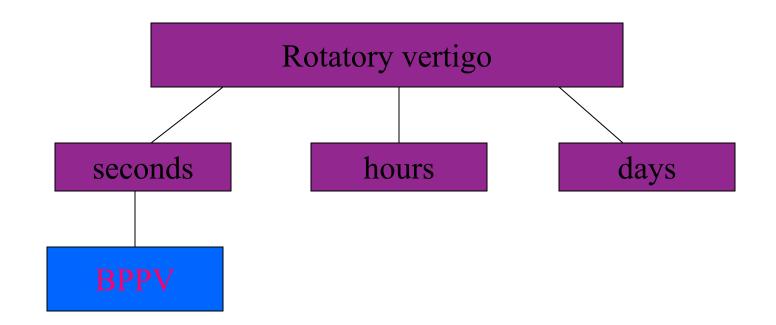
ASSESSMENT

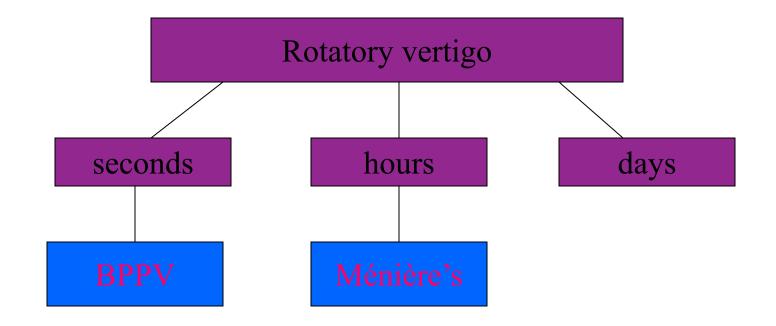
- Examination
 - Nystagmus vestibulo-ocular reflex
 - Direction of fast phase of eye movement is opposite to ear with damaged/ paretic labyrinth, but body falls to same side
- Positionals
- Calorics
- Sinusoidal (Rotary chair)

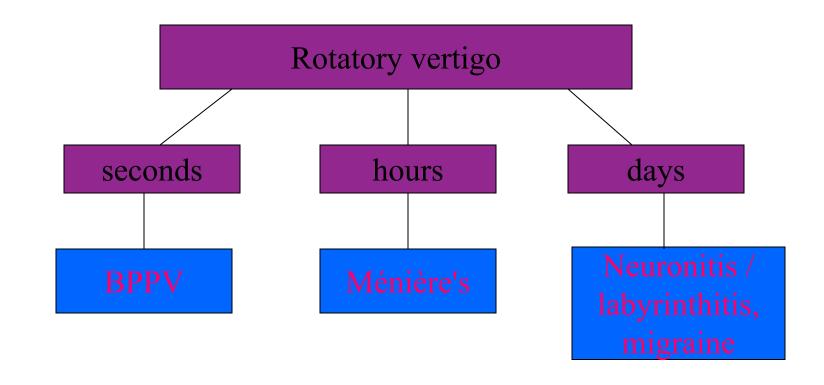
ASSESSMENT

- Vestibular investigations
 - Rarely needed but can be used to assess VOR, peripheral vestibular function
- Imaging
 - MRI
- If Hx doesn't fit with above diagnoses, or if something 'not quite right', atypical nystagmus – need to exclude brain lesions









Rehabilitation

To help regain control, relieve anxiety, fear of stigmatization, isolation

Vestibular rehabilitation

Changing environment

- Replace rugs, improve lighting, handholds
- Ambulatory support



Drugs

- For acute vertigo, may prescribe very short or single dose of vestibular sedative
- In cases of Meniere's, may have preventative action (placebo?)
- DO NOT continue vestibular sedatives long term or use; it prevents full compensation and sedates the remaining functioning part of vestibular system

<u>References</u>

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Beach Audiology Hearing & Balance Center

QUESTIONS ???



Thank You!



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