Neuro-Vision

Nina Hopkins, OT

Neuro-Vision

OT Role

Vision Assessment

P.O.C.

Rx Process

Referrals

D/C



OT Role

Identify struggles, impairments & concerns that impact function for an individual. Look at physical, visual-perceptual, cognitive, emotional and social skills. Facilitate learning strategies and compensatory skills to maximize functional skills.

Thoroughly review medical chart and ask lots of specific questions about before-after and what is different, how is it different, why

Referrals to OT also arise from other disciplines (SLP, PT, Nurse, caregiver, family, neuro-optometrist, PCP, Neurologist, NP)



Vision Assessment

H/A? Dizziness? Nausea? Reading Problems? Walking at night or managing stairs?

BIVSS – Brain Injury Visual Symptom Survey

MOCA, Trails Test, MVPT-R, MVPT-4

Acuity Saccades & Pursuits Peripheral Fields Convergence & Divergence Strabismus Visual-Motor Integration Visual-Perceptual Skills

Vestibular Impairment? Neglect or Inattention Issue? Memory or Attention Deficit? Emotional/Psych Hx? ADD? Stress levels?





Education & Instruction - Written (understand, acknowledge, guide)

Referrals

Exercises – vision can somewhat be improved w/ controlled practice of visual tasks (neuroplasticity)

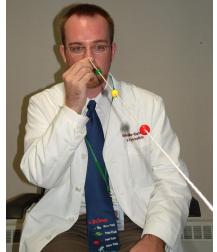
Manual Therapies – decrease tension, pain and stress resulting in improved focus and learning *

Relaxation Techniques *

HEP

Binder/Day Planner

Functional Activities









Treatment Process

Strategies:

-minimize glare: colors, lighting, contrast -structure for scanning -repetition -start small and build - simple to complex: paper-table-room-gym-outside -increase use of other senses -write everything down - day planner, phone, binder -repetition -functional tasks: w/ & w/o distractions environment (go left ...) - constraint induced therapy family, friends & caregivers mediation to increase focus Modified Cawthorne-Cooksey Exercises

-s.u. -C.I.T. simulation -educate -verbal -vestibular -

-perceptual - subtle and measured in function ie: object, word recognition, reading speed, reaching for objects, curbs and doorframes, dressing

-modifications - organization strategies, use hand to feel for stubble or dirt when shaving or cleaning, recheck work, listen for cars, look for edges, -scanning skills - look in direction of field loss, Drw line down edge of paper or bright tape on left of table or computer screen, use an organized approach to scanning, compensatory strategies like line markers, light brown paper instead of white, increase font and spacing, glare avoidance, hat w/ a brim, sunglasses, blue transparency over paper, eccentric viewing.....









Referrals

Recommend individual get eyes tested for acuity and health

Recommend to PCP or Neurologist that individual be assessed by NeuroVision Optometrist



Written HEP Written Strategy List Education & Instruction Follow-Up Visits PRN



References

Adapted from Dix and Hood, 1984 and Herdman, 1994: 2000

Vestibular Rehabilitation Therapy(VRT), Timothy C.Hain,MD website: Dizziness-and-balance.com. 4-14-2022 last modified

Low Vision Rehabilitation A Practice Guide for Occupational Therapists 2nd edition; Stephen G.Whittaker, Mitchell Scheiman, a nd Debra A. Sokol-McKay 2016.

BIVSS Questionnaire. Hanna Laukkanen, Mitchell Scheiman and John R. Hayes.2016. Optometry and Vision Science. American Academy of Optometry. Vol. 93 NO 00 PP 00-00

MoCA -Montreal Cognitive Assessment copyright 2022. Ziad Nasreddine MD info@mocatest.org

INANK

you





