

HOW SHOULD THE VISUAL FUNCTION BE EVALUATED IN OPTIC NEURITIS PATIENTS?

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Optic Neuritis (ON) is an inflammatory demyelinating optic neuropathy. It is obscure which visual function test (VFT) is more valuable clinically. In the study VFT were compared in terms of utility for evaluating and monitoring the patients. We evaluated 73 patients with ON over the last 3 years with detailed neuro-ophthalmological tests [visual acuity (VA), color vision (CV), contrast sensitivity (CS), visual fields (VF), pupils and their reactions], visual evoked potentials (VEP) and OCT. ON cases composed of 54F and 19M, and the median age is 30. They consist of 62 MS, 5 NMO and idiopathic ON. VA was complete in 102 of all 146 eyes, 53 of 91 eyes with ON history (ON+) and 49 of 54 with no ON history (ON-). VA of the ON+ eyes was found to be 0.82 ± 0.27 and of ON(-) eyes to be 0.96 ± 0.13 . VA difference between the affected eye and the other was significant ($p = 0,01$). CV was found to be 19.92 ± 7.00 in affected eyes and 22.59 ± 2.4 ($p=0,001$) in the others, CS to be 69.08 ± 31.7 vs 94.85 ± 25.8 ($p0.001$), P100 latency to be 129.02 ± 22.5 vs 115.37 ± 16.2 ($p0.05$), and RNFL thickness to be 87.88 ± 28.6 vs 110.50 ± 19.6 ($p=0.031$) in the affected eyes and in the others, respectively. Positive correlations were demonstrated between VA and CV, and CS and RNFL thickness, and a negative correlation with P100 latency. Although CS appears to be the most practical and sensitive parameter in VA' evaluation, it was concluded that different combinations could be employed for different purposes.