Zastosowanie testu VHIT (Videonystagmography Head Impulse Test) w diagnostyce uszkodzeń kanałów półkolistych
The use of VHIT (Videonystagmography Head Impulse Test) in the diagnostics of semicircular canal injuries

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SUMMARY

Introduction: The aim of that work was to evaluate the usefulness of VHIT (Videonystagmography Head Impulse Test) in the diagnostics of injuries to the semicircular canals.

Material and methods: The tests covered 58 patients aged 20–27, including 34 women and 24 men. Any deviations within the vestibular organs were excluded in the interview, otorhinolaryngological examination and full videonystagmographic test. The tests checked functions of the semicircular canals in the following way: in a sitting position and the head leaned forward at 30° the patient was looking at a motionless point while quick movements to the left or right were performed to stimulate a particular lateral semicircular canal. When the vertical semicircular canals were tested the head was inclined laterally to the right side at 45°. Then similar movements were performed forwards (stimulation of the left anterior semicircular canal) and backwards (stimulation of the right posterior semicircular canal). When the head was leaned laterally to the left at 45° the right or left anterior semicircular canal was stimulated respectively. Functions of the canal were determined on the basis of gain (%).

Results of the tests: In 58 patients the gain value for particular semicircular canals was normal, and the mean values presented as follows: the lateral semicircular canal: 11.9%±10.2, the anterior semicircular canal: 17.5%±11.6 and the posterior semicircular canal: 19.2%±13.5, whereas on the left side: 10.3%±7.9, 18.1%±11.1, 15.1%±12.3 respectively. In one man the gain value for the right posterior semicircular canal was found significantly above the standard value – 71%.

Conclusion: VHIT showed much more sensitive than a full videonystagmographic test.

Hasła indeksowe: test VHIT, czynność kanałów półkolistych

Key words: VHIT, semicircular canal functions