

WAARDENBURG SYNDROME, A CASE REPORT

Amanda V. Arantes¹; Bruno R. Silva¹; Arnaldo F. Bordon²

¹ Fellow of Retina and Vitreous Service - Hospital Oftalmológico de Sorocaba

² Head of Retina and Vitreous Service - Hospital Oftalmológico de Sorocaba

PURPOSE: To report a case of Waardenburg Syndrome

METHODS: Case report; literature review

RESULTS: Nine-years old, white, female, complaining of decreases visual acuity (VA) on her left eye (OS) for 1 year. She has neurosensorial deafness in her right ear. VA was 20/20 OU and the intraocular pressure was within normal range. Eye examination showed depigmentation of the iris and at fundus on OS. Physical examination showed clusters of white skin spots and localized gray hair. Genetic testing was positive for PAX3 mutation.

DISCUSSION: Waardenburg Syndrome (WS) type 1 is autosomal dominant and is caused by mutations of several genes that affect the division and migration of neural crest cells during embryonic development. It has major (congenital neurosensorial deafness, white forelock, complete hypoplastic blue iris, dystopia canthorum) and minor diagnostic criteria (skin hypopigmentation and broad high nasal root). Two major or 1 major and 2 minor are sufficient for the diagnosis. The reported patient has 4 major criteria, and 2 minor criteria.

Patients with WS have fundus hypopigmentation in 67%. Despite of the broad range of abnormalities in this condition, VA generally remains good, so no treatment is needed.

REFERENCES

- 1.Naila Ahmed jan; Ryan K. Mui; Sadia Masood; Waardenburg Syndrome.2022 Jul 5. In: StatPearls [Internet]. Treasure Island (FL): StatPearls Publishing; 2022 Jan—.
- 2.Shin J, Lee EK. Rhegmatogenous Retinal Detachment in Waardenburg Syndrome: A Case Report. Korean J Ophthalmol. 2022 Oct;36(5):468-470. doi: 10.3341/kjo.2022.0052. Epub 2022 Aug 19. PMID: 35989071; PMCID: PMC9582499.
- 3.Shields CL, Nickerson SJ, Al-Dahmash S, Shields JA. Waardenburg syndrome: iris and choroidal hypopigmentation: findings on anterior and posterior segment imaging. JAMA Ophthalmol. 2013 Sep;131(9):1167-73. doi: 10.1001/jamaophthalmol.2013.4190. PMID: 23868078.

