

IMAGES IN CLINICAL MEDICINE

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Scleral Discoloration from Minocycline Treatment



A 70-YEAR-OLD MAN PRESENTED TO THE OPHTHALMOLOGY CLINIC WITH A 1-year history of progressive bluish discoloration of the sclerae of both eyes. He reported no ocular discomfort or blurry vision. He had previously received a diagnosis of an inflammatory arthritis for which he had been taking minocycline at a dose of 100 mg daily for more than 15 years. Ophthalmologic examination was notable for a bluish discoloration of the sclerae. Extraocular movements were intact, and the pupils were equal and reactive to light. Best corrected visual acuity, visual fields, and intraocular pressure were normal. Ocular coherence tomography showed no scleral thinning. Bluish discoloration of the pinnae of both ears was also noted. Minocycline-induced pigmentation was diagnosed. Prolonged treatment with minocycline can cause blue-gray pigmentation of the skin, sclerae, pinnae, fingernails, teeth, gums, and scar tissue. A proposed mechanism for this pigmentation is that metabolites of minocycline form insoluble complexes with melanin or iron that can deposit in body tissues, particularly in tissues that are exposed to light. The staining may resolve slowly, or it can be permanent. The patient returned to the referring rheumatologist, who, following the recommendation of the ophthalmologist, advised him to stop taking minocycline. At a follow-up visit 1 year after treatment with minocycline was stopped, minimal reduction in the scleral pigmentation was noted.

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