



Severe Herpes Zoster Ophthalmicus in an Immunocompromised Patient

IMAGE Esma Eren¹ , Leylagül Kaynar² , Mehmet Doğanay¹ 

A 65-year-old male presented with pain and redness on the right side of his face since a few days. On medical history, he underwent bone marrow transplantation from full match donor for AML-M5 3 years ago. He was followed in remission for 2 years. On physical examination, the findings were as follows: temperature was 36.7°C, blood pressure was 110/70 mmHg, and pulse rate was 84/min. Erythema and vesicles were observed on the right frontal area and scalp limited with dermatome of the trigeminal nerve ophthalmic branch (V1) (Figure A). Respiratory and abdominal examinations were normal. Results of laboratory analysis were as follows: neutrophil cell count was 3360/mm³, hemoglobin was 14 mg/dL, creatinine was 1.0 mg/dL, and liver enzymes were normal. Atypical cells were not observed in peripheral blood smear. On cranial computer tomography, bilateral orbital cavity was normal, but an infiltration was observed starting from the right frontal region including periorbital and zygomatic regions. The initial therapy was acyclovir 10 mg/kg provided thrice a day and 4 mg/kg daptomycin. Ophthalmologic examination showed herpetic lesions on the cornea, and topical ganciclovir application was also added to the initial therapy. Vesicular lesions improved on the 14th day of acyclovir treatment (Figure B). After a week cessation of antimicrobial therapy, the patient presented with severe pain in the lesion area. He was diagnosed with postherpetic neuralgia, and antidepressant treatment (duloxetine) was initiated.

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Patient's consent was obtained to publish the image

Figure 1. An extensive erythema, redness and vesicular lesion on ophthalmic branch of trigeminal nerve.

Viral infections can be severe and life threatening in the course of hematopoietic stem cell transplantation (HSCT) due to T-cell depression. Varicella zoster virus infection may cause localized or disseminated infec-



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Figure 2. Healing and resolving the lesions at the 14th day of therapy.

tion in patients with HSCT (1). Herpes zoster ophthalmicus (HZO) is caused by the reactivation of the varicella zoster virus in the ophthalmic branch of the trigeminal nerve (2). The most common complication of HZO is postherpetic neuralgia (PHN). PHN is severe pain in the lesion area that occurs within 90 days after the rash. In the treatment of PHN, antiviral therapy and gabapentin, tricyclic antidepressants, or SSRI are recommended. Besides, ocular involvement, such as blepharitis, keratoconjunctivitis, iritis, scleritis, and acute retinal necrosis, may occur in patients with HZO. The differential diagnosis of HZO includes cellulitis, mucor (in immunocompromised patients), other viral inflammation caused by mumps, or syphilis (3). The image of the patient undergoing HZO is presented in here. Early diagnosis of HZO in immunosuppressed patients and early initiation of treatment are effective in preventing serious complications.

The patient was verbally informed, and written consent was taken.

Informed Consent: Verbally and written informed consent was obtained from patients who participated in this study.

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