# Varicella zoster meningitis: A rare case of disseminated reactivation

PAUL FRANCOIS MD, LAURA SORABELLA MD, KAITLYN BRENNAN DO, MPH

1. Department of Anesthesiology, Vanderbilt University Medical Center, Nashville, TN.

## DEPARTMENT OF ANESTHESIOLOGY

VANDERBILT WUNIVERSITY
MEDICAL CENTER

#### **CASE HISTORY**

34-year-old G4P3003 at 22w1d with 2 weeks of fatigue and pruritic, painful skin lesions.

#### PHYSICAL EXAM

T: 97.6 F - BP: 105/63 (MAP 75) - HR: 58-

RR: 18- SpO2: 100%

Patient reported headache, photophobia, and neck rigidity. Small vesicular and crusted lesion on erythematous base noted on right buttock with radiation to her medial thigh.

#### **EVALUATION**

P

	<u>B</u>	MP_	CBC			
136	109	8	8.6		11.3	
3.4	20	0.60; 0.60	84	8.8	><	173
					33	

		C3F 3TUDIE3
Tube 1	08/22/24	Tube Number CSF
Colorless Cl.	. 08/22/24	Gross Appearance CSF
178 🔺	08/22/24	Nucleated Cells CSF
0	08/22/24	RBC Count CSF
100	08/22/24	Total Cells CSF
48	08/22/24	Neutrophil CSF
33	08/22/24	Lymphocyte CSF
12	08/22/24	Monocyte/Macrophage CSF
3	08/22/24	Eosinophil CSF
4	08/22/24	Atypical cell CSF
See Diff Belo	w 08/22/24	Manual Diff CSF
Atypical I	08/22/24	Comment CSF
44 ▼ 🗈	08/22/24	Glucose CSF
71 ^ 🖹	08/22/24	Protein CSF

C

		ID PANELS
Not Detected	08/22/24	Escherichia coli K1 MEP (Result)
Not Detected	08/22/24	Haemophilus influenzae MEP (Res
Not Detected	08/22/24	Listeria monocytogenes MEP (Res
Not Detected	08/22/24	Neisseria meningitidis MEP (Result)
Not Detected	08/22/24	Streptococcus agalactiae MEP (Re
Not Detected	08/22/24	Streptococcus pneumoniae MEP (
Not Detected	08/22/24	Cytomegalovirus MEP (Result)
Not Detected	08/22/24	Enterovirus MEP (Result)
Not Detected	08/22/24	Herpes simplex virus 1 MEP (Result)
Not Detected	08/22/24	Herpes simplex virus 2 MEP (Result)
Not Detected	08/22/24	Human herpesvirus 6 MEP (Result)
Not Detected	08/22/24	Human parechovirus MEP (Result)
Detected !	08/22/24	Varicella zoster virus MEP (Result)
Not Detected	08/22/24	Cryptococcus neoformans/gattii M
CSF 🗈	08/22/24	MEP (Specimen Type)

Figure 2 – A) Admission labs from the patient B) Results of CSF studies obtained by obstetric anesthesia team. C) Viral PCR showing positive Varicella

#### **MANAGEMENT**

- Following VZV (+) CSF studies, IV acyclovir started for 14 days. Patient discharged with PICC for continued antiviral administration.
- Ultimately patient had quick resolution of symptoms following acyclovir and delivered a healthy boy at 39w1d using nitrous oxide for labor analgesia.

Figure 3: Vesicular lesions following treatment with a cycloving

### **KEY POINTS**

Broad Differential: Considering less common etiologies like VZV in pregnant patients. Reactivation and Exposure: Prior VZV infection doesn't eliminate the risk of reactivation. Anesthetic implications following CNS involvement from viral meningitis

Figure 1.) Vesicular lesions found on the patient