The patient, a 7 year old white female, was admitted to Evanston Hospital on 10-66 in a comatose state. On 9-27-66, she developed what was diagnosed as an upper respiratory infection. Two days prior to admission she began vomiting dark brown material and on the day of admission her rectal temperature rose to 107°. Positive physical findings at the time of admission included a bilaterally positive Babinski sign, hyperactive knee jerks, absent abdominal reflexes, and extensor spasticity of the legs. The pharynx showed hemorrhagic areas with petechial-like lesions. A spinal tap was traumatic. The child was given antibiotics, Cortisone, and treated symptomatically but she remained in a comatose state. She developed what appeared to be renal failure and peritoneal dialysis was begun on 10-13-66. On 10-15, she went into shock and on 10-16 upper gastrointestinal bleeding was noted. This persisted until her death on 10-18-66 following a period of respiratory distress.

At autopsy the brain was not swollen. No focal lesions were found in the cerebral hemispheres or brain stem. The cerebellum showed bilateral hemorrhagic areas in the mid-potion of the hemispheres involving both grey and white matter. A virus was isolated from the stool and spinal fluid during life and from the brain at autopsy. This has been identified as Coxsackie B4.

Points for discussion: 1. Changes related to viral infection or to generalized anoxia?

2. If viral-related, due to primary encephalitis or to secondary "immune" reaction?