Sudden Hemiparesis as the Presenting Sign in Cryptococcal Meningoencephalitis

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SUMMARY A previously healthy young man presented with an acute stroke syndrome and was found to have cryptococcal organisms in the CSF. Though an initial CSF examination for an infectious etiology was negative, a second lumbar puncture was performed because of hypoglycorrhachia, which established the diagnosis. An uneventful recovery followed the administration of Amphotericin B and 5-Flucytosine.

A literature search revealed only one previously reported case of cryptococcal meningoencephalitis presenting as a stroke. The need for performing a CSF examination on young patients presenting with a cerebrovascular event, and the aggressive investigation of unexplained hypoglycorrhachia are emphasized.

Discussion

Acute cerebrovascular syndromes are uncommonly reported in cryptococcal meningoencephalitis. Aber-
A rare proliferative endarteritis was present. The patient had all three forms, but the cerebral infarction would seem to be secondary to one of the latter two. Possibly a rare proliferative endarteritis was present.

In a young patient with an unexplained acute stroke syndrome, a CSF examination is mandatory. Hypoglycemia of unknown etiology in any age group, must be aggressively pursued, and may require repeated lumbar punctures. In cryptococcal meningitis, even if appropriate microbiologic evaluation of the CSF is ordered, it is not uncommon for a single cerebrospinal fluid examination to fail to reveal the presence of the organism. In our case, the first set of cultures showed no growth when they were discarded 48 hours after inoculation. The second specimen was incubated longer and showed growth of the fungus after 72 hours. The India Ink preparation from the second CSF specimen revealed rare (fewer than 10 per slide) budding yeasts with morphology compatible with Cryptococcus neoformans only after prolonged examination.

The prompt response to antifungal therapy in our case was gratifying. However, prolonged administration of antifungals is required to sterilize the CSF. Some patients will have persistent low antigen titers in the CSF and positive smears, even though cultures are negative and the symptoms have resolved. Relapses are common.

Acknowledgment

The authors would like to thank Dr. J. Alfred Jones of State College Pennsylvania for referring the patient.

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