

Conclusion. SSAs are beneficial in the long-term treatment of patients with subarachnoid NCC or chronic perilesional edema. The formulation of guidelines that include multiple options for SSAs will be essential in guiding management of complicated NCC.

Figure 1. T2-weighted MRI images for patient 1 revealed multiple subarachnoid cysts in the basilar, perimesencephalic, quadrigeminal, and perisylvian cisterns.

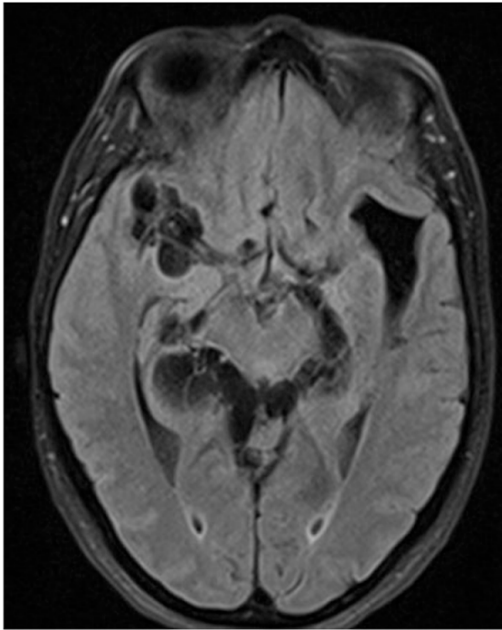


Figure 1. Post-contrast T1-weighted MRI images for patient 2 revealed A) a nodular focus of enhancement within the fourth ventricle with B) resulting obstruction and dilation.

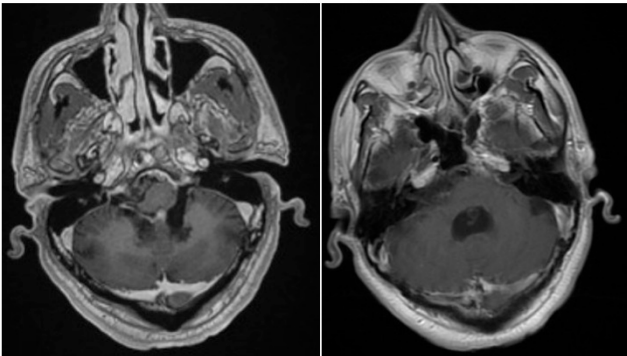


Figure 3. A) T1-weighted post-contrast and B) T2-weighted FLAIR MRI images for patient 3 revealed multiple ring-enhancing, cystic lesions with extensive surrounding edema.

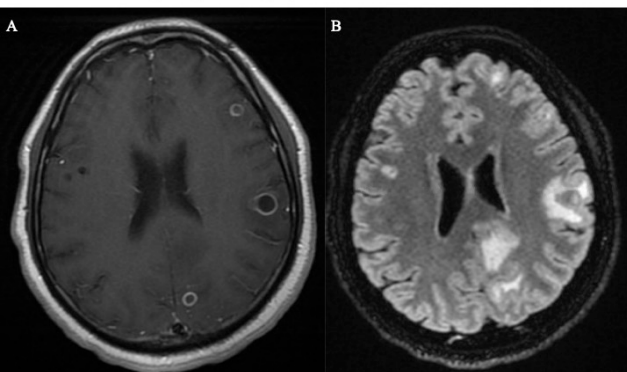
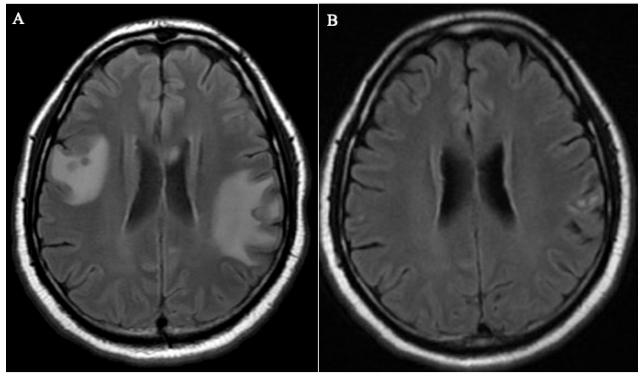


Figure 4. T2-weighted FLAIR images for patient 3 A) on steroids and MTX alone and B) after the addition of adalimumab, demonstrating marked improvement in perilesional edema.



Disclosures. All authors: No reported disclosures.

1407. Potential Impact of the Biofire® Film Array Meningitis and Encephalitis (ME) Panel in Reducing Repeat Lumbar Punctures in Patients with Meningitis and Encephalitis

Elizabeth A. Aguilera, MD¹; Shelby Simar, MPH²; Susan H. Wootton, MD³; Rodrigo Hasbun, MD, MPH¹; ¹The University of Texas Health Science Center at Houston, Houston, Texas; ²The University of Texas Health Science Center at Houston, School of Public Health, Houston, Texas; ³McGovern Medical School at the University of Texas Health Science Center at Houston, Houston, Texas

Session: 155. CNS Infections
Friday, October 4, 2019: 12:15 PM

Background. The Biofire® FilmArray Meningitis Encephalitis (FAME) is a multiplex polymerase chain reaction (PCR) test can rapidly detect up to 14 pathogens that cause meningitis and encephalitis. The impact on preventing repeat lumbar punctures to obtain more diagnostic studies is currently unknown.

Methods. Patients admitted to Memorial Hermann Hospital (MHH) between July 2018-February 2019 with community-acquired symptoms of meningitis or encephalitis, CSF with white blood cell count >5 cells/mm³, and with leftover CSF at the MHH microbiology laboratory were eligible for the study. Testing FAME was performed after discharge for specimens that had not been centrifuged, had a volume of ≥200 µL, were appropriately stored, and were collected by lumbar puncture (LP) for evaluation of suspected meningitis/encephalitis.

Results. Of 1,382 CSF specimens screened, 70 (5.0%) met the criteria and were tested with FAME. The majority was adults (72.8%), non-Caucasian (68.6%), male (60%), immunocompetent (75.7%) and had a meningitis presentation (75.7%). Mean age was 36.9 years (1 mo-89 years). The mean duration between CSF collection and any PCR result done in the hospital was 60 hours. Fifteen patients (21.4%) required 25 repeat LPs [13 (86.6%) for additional testing (7 (53.8%) pediatric patients) and 2 (13.3%) for cryptococcal meningitis assessment]. The FAME could have prevented repeat LPs in 86.6% of patients. Five of the 13 repeat LP (38.4%) FA ME showed a pathogen [VZV (2), HSV 1 (1), HHV-6 (1), *Neisseria meningitidis* (1)]. Of 46 tests with negative FA ME, acyclovir therapy was started in 22 (47.8%) with a mean of 6 doses dispensed. 38 (26.6%) patients were discharged with an unknown etiology of whom FA ME was positive in 8 (21%) [HSV2 (37.5%), VZV (25%), Enterovirus (25%) and HSV1 (12.5%)]. PCR was ordered in the hospital for only 4 (50%) of these patients.

Conclusion. The FAME identified an etiology in 21% of patients with meningitis and encephalitis symptoms discharged with an unknown etiology. A total of 18.5% of patients required a repeat LP for additional testing. FAME testing offers an avenue for reducing the burden of repeat LPs and duration of unnecessary anti-infective therapy while increasing diagnostic yield.

Disclosures. All authors: No reported disclosures.

1408. *Treponema pallidum*-Specific Antibody Testing in the Evaluation of Neurosyphilis, a Prospective Trial

Travis M. Larsen; Natalie Campen; Robert Larsen, MD; LAC+USC, Los Angeles, California

Session: 155. CNS Infections
Friday, October 4, 2019: 12:15 PM

Background. The therapeutic challenges of neurosyphilis are rooted in its diagnosis and management, with potential for complications arising from asymptomatic, unrecognized, or under-treated disease. Currently, the non-treponemal VDRL testing of cerebrospinal fluid (CSF) samples is used to predict those with CNS invasion by *T. pallidum*. However, more extensive evaluation of those at any stage of infection demonstrates both that the incidence of CNS invasion is much greater than predicted, and there exists a large proportion of false positives from VDRL testing alone.