Reviewer's report

Title: Adjuvant TACE inhibitor treatment improves the outcome of TLR2-/- mice with experimental pneumococcal meningitis

Version: 1 Date: 28 September 2006

Reviewer: A.M. M van Furth

Reviewer's report:

General

Major Compulsory Revisions (that the author must respond to before a decision on publication can be reached)

This paper describes the effect of adjuvant TACE inhibitor treatment on the outcome of TLR 2 -/-, CD14 -/-, and TLR2/CD14 -/-.
As primary endpoints: survival, bacterial growth in CSF, severity score, and TNF levels in CSF were obtained.
In their discussion the authors state that bacterial load and TNF levels in CSF are major determinants for outcome.
A problem with these studies in my opinion is that the authors didn't mention anything about the effect of the treatment with TACE inhibitor on the number of leukocytes in the CSF, a major hallmark of bacterial meningitis, nor on the effect on the production of other cytokines and chemokines (in brainhomgenates)which also are very important determinants for outcome. Also histopathology of the brain of the various mice before and after treatment will give important information about the effect of TACE inhibitor on meningeal inflammation and should be included.

Minor Essential Revisions (such as missing labels on figures, or the wrong use of a term, which the author can be trusted to correct)

Discretionary Revisions (which the author can choose to ignore)

What next?: Unable to decide on acceptance or rejection until the authors have responded to the major compulsory revisions

Level of interest: An article whose findings are important to those with closely related research interests

Quality of written English: Acceptable

Statistical review: No

Declaration of competing interests:

I declare that I have no competing interest's