Reviewer’s report

Title: Use of multiple methods for genotyping of Fusarium solani during an outbreak of contact lens associated fungal keratitis in Singapore

Version: 2 Date: 13 May 2008

Reviewer: Kerry O'Donnell

Reviewer’s report:

Use of multiple methods for genotyping Fusarium solani species (FSSC) during an outbreak of contact lens associated fungal keratitis in Singapore – Jureen et al.

[Major Compulsory Revisions]

As stated in my earlier review, the authors must clearly indicate by isolate number/genotype which 10 isolates from Chang et al. 2006 (citation 7) were included in the present study. This reviewer feels that inclusion of this comparison is essential to see how the various multilocus haplotypes [i.e., FSSC 2-d, FSSC 2-f and FSSC 2-e] from Chang et al. 2006 were grouped via the methods employed by the authors.

4.6-9. As noted on page 12.1-4 in the present study, Chang et al. (citation 3) previously reported that at least 3 multilocus haplotypes within the FSSC were involved in the outbreak in Singapore. Therefore, it has already been established that a single clone was not responsible for the Singapore outbreak. For this reason, aim (1) needs to be reworded or removed from the text.

5.11. If the strains are available for distribution, then the authors should spell this out clearly here. Otherwise, the strains should be deposited in an internationally accessible culture collection so that the results reported here can be replicated and extended in the future by qualified researchers.

12.1-7. and Fig. 1. The 10 Singapore strains included in Chang et al. 2006 (citation 3) should be listed by genotype [i.e., FSSC 2-d, FSSC 2-f or FSSC 2-e] in Fig. 1 so that the reader can evaluate whether each sequence type formed an exclusive group in the present study. Also it would be highly desirable to provide equivalent numbers from Chang et al. so that all 10 strains can be identified precisely. If the authors do not have the equivalent numbers, then they should obtain them from the Centers for Disease Control (CDC).

[Minor Essential Revisions]

1.1. Throughout the manuscript, including the title, the authors should refer to genotyping members of the Fusarium solani species complex (FSSC). Genotyping of Fusarium solani species complex is awkwardly worded.

1.8. Citation for Fusarium solani species complex needed here.
3.1. The filamentous fungi Fusarium spp. is awkwardly worded.

3.23. The outbreak within the U.S. should be referred to as Fusarium keratitis (citations 3 and 7) because fusaria other than members of the Fusarium solani species complex were involved.

4.17. and 5.2-3. 28S rRNA sequencing can be used to identify isolates to species complexes, but not species within Fusarium. Therefore, this needs to be made clear.

8.8. less than, not then.

Fig. 1. Nigeria should be added to the Location column for ATCC 36031.

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

Quality of written English: Needs some language corrections before being published

Statistical review: No, the manuscript does not need to be seen by a statistician.

Declaration of competing interests:

'I declare that I have no competing interests'