Reviewer's report

Title: Cytokine gene polymorphisms and serum cytokine levels in patients with idiopathic pulmonary fibrosis

Version: 1 Date: 8 December 2012

Reviewer: Saeed Daneshmandi

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1. Sample size of 60 patients is a low number sample size and insignificant data may be due to low number of studied patients. Especially when comparison of several alleles and genotypes on a chromosome is considered low number of samples could not be able to show the exact correlations. So if it is possible authors increase the number of patients.

2. There are no data for analysis of Allele differences. Please analysis Allele distributions in Patients and Controls.

3. Authors can evaluate correlation of partial data such as PFT with distribution of polymorphisms in there patient. It may have some valuable data. For a sample authors can see article below: Mol Biol Rep. 2012 Feb;39(2):1845-53.

4. In Results section please mention the P value amount for all significant and insignificant data. There is no P value for insignificant data in Result section.

5. Deviations from expected Hardy–Weinberg were not calculated.

6. How the patients were selected for cytokine ELISA would be clearly mentioned in text and also legend of cytokine levels Table.

7. Statistical method would be mentioned in Table legends.

8. Authors mentioned: “Xaubet and colleagues found associations between TGF-#1 polymorphisms and disease progression in IPF patients [9], but their findings have not yet been validated by other studies, and thus TGF-#1 gene polymorphisms cannot yet be advocated as a genetic marker for IPF.” But authors could review article below for correlation of TGF-b polymorphism with IPF: Chin Med J (Engl). 2011 Jul 5;124(13):1923-7.

9. Why authors selected these SNPs for evaluation in their patients and controls? These polymorphisms affect cytokine production or function? If these SNPs affect cytokine production, the amounts of cytokine serum levels in healthy control subjects were different in different cytokine allele and genotypes?

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: Yes, and I have assessed the statistics in my report.