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Journal Name:	British Journal of Mathematics & Computer Science
Manuscript Number:	2014_BJMCS_13916
Title of the Manuscript:	A new approach to H_∞ filtering for switched T-S fuzzy systems with interval time varying delays and parameter uncertainties
Type of the Article	Original Research Article

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This journal's peer review policy states that **NO** manuscript should be rejected only on the basis of '**lack of Novelty**', provided the manuscript is scientifically robust and technically sound.

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PART 1: Review Comments

	Reviewer's comment	Author's comment (if agreed with reviewer, correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)
Compulsory REVISION comments	1. This paper investigates a new approach to H_{∞} filtering for switched T-S fuzzy systems, however, the "new" is not reflected in the abstract and even in the conclusion. In this two parts, the contributions of this manuscript should be more clearly explained with more details on how to improve the existing results, especially in the references the author cited. 2. There exists some spelling mistakes, such as "tree" in line 11,51,320, "sovable" in line 271,311, etc. 3. There are some grammatical errors including the problems of tense and singular and plural form in the "Introduction" part, such as "has came to" in line 16, "where in [20]" in line 35, "delay" in line 8,29 and so on. 4. In this manuscript, some descriptions are not reasonable and the sentence structures need to be adjusted, such as "Switched linear filters ... are studied in [22]" in line 40-42, "We have studied ... is investigated" in line 393, etc. The content between line 67 and line81 can be omitted for that it is the same meaning with the content in line 61. 5. It would be better to capitalize the first letter of proper nouns, such as "lyapunov krasovskii" in line 47, "schur complement" in line 47. 6. The letter characters are reused, which is easy to cause confusion, such as "both of premise variables and controlled output are denoted by $z(t)$", "the letter j appearing in switching sequence and membership function is also ambiguous".	The paper is extensively revised. The introduction is rewritten and the paper is corrected The premise variables are denoted by $\eta(t)$ The part showing the switching of the system matrices is omitted. The letter j is changed in the membership function The augmented systems matrices are revised Asymptotically stable: studied the stability for nominal system i.e without terms of uncertainty and robustly stable with the terms uncertainly. We have added remark 3.2 and remark 4.2



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	7. The inconsistent expressions occur in this paper and the author should make clear whether these are the abbreviation or other means, such as the “σ” in (2.1) and “$\sigma(t)$” in line 61, “$\omega(t) \in L_2[0, \infty]$” in line 130 and “$\omega(t) \in L_2[0, \infty]$” in line 220. 8. There are some problems in the fomula derivation part and careful examination is needed, such as the coefficient matrix $\tilde{B}_{wj}$, $\Delta\tilde{B}_{wj}(t)$, $\tilde{C}_{dj}$, $\Delta\tilde{C}_{dj}(t)$ in (2.11), the description of (3.9) has a problem and what meaning of the notation “Υ”? 9. In this manuscript, the two concepts of “asymptotically stable” and “robustly stable” are mentioned in Theorem 3.2 and Corollary 3.2, respectively. Here, what is the difference between these two concepts? 10. For Theorem 4.1, sufficient conditions are given. Are there any conservativeness brought by these sufficient conditions? A remark might be needed to address this issue.	
<u>Minor</u> REVISION comments		
<u>Optional/General</u> comments		