



SDI Review Form 1.6

Journal Name:	International Journal of Biochemistry Research & Review
Manuscript Number:	2013_IJBcRR_8453
Title of the Manuscript:	Role of the Trp-disulfide triads in the UV light induced degradation of a monoclonal antibody scFv
Type of the Article	

General guideline for Peer Review process:

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.

To know the complete guideline for Peer Review process, reviewers are requested to visit this link:

(<http://www.sciencedomain.org/page.php?id=sdi-general-editorial-policy#Peer-Review-Guideline>)



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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	Abstract: Format, for clarification, by stating rationale, methods, results, and conclusion/inference based on the results Introduction: - Break into paragraphs - Following the information at the start of the manuscript on UVB radiation - Include information on tryptophan fluorescence, alteration of tryptophan fluorescence by UVB radiation, the splitting of disulphide bonds possibly leading to polymerization, and the loss of function/affinity - - Include the rationale for substitution with phenylalanine, and the selection von Willebrand factor	Abstract: we followed suggestion (see in the manuscript) Introduction: - it is corrected - we renewed the text of Introduction We wrote in details about the phenomenon of Trp-mediated photolysis and the splitting of disulphide bond - <i>W – F substitution:</i> lines 45-48. In our earlier study with GLA reflected that Phe residues are good replacing the Trp residue, because both steric specificity and hydrophobicity are similar. In the case of GLA a modelling program computed that replacing (see ref.10). - <i>selection of VWF:</i> we changed the text to clarify the choice better see lines 81-83: “We used a monoclonal antibody against human von Willebrand factor (VWF), 82D6A3 [13,14] with known sequence and crystal structure and that contains Trp-disulfide triads, which



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	- Expand on the significance of the research for biosensors - Have a last paragraph that chalks out the research project and clarifies a hypothesis Clarify reason for the section heading of Results and Discussion; when there is a separate section for Discussion Conclusion: Transfer suggestions to Discussion section. Conclude on the research project	belongs to the immunoglobulin superfamily (IgSF) [15]. “ We have reflected and compared our results with the data of ref. 12. See in the lines: 428-431 “Our results show that our studied protein fragment (scFv82D6A3) couldn’t be applied as a good biosensor which could of course be due to the small size of the scFv. We were surprised, because the most of IgG proteins usually can serve as a good biosensor.” We edited the last paragraph as requested The reviewer is right – we made a mistake with numbering. We have already separated the part “Results” from the part “Discussion“ and we wrote a new “Conclusion”
<u>Minor</u> REVISION comments		
<u>Optional/General</u> comments	-	