

Reply to referee report

Thank you very much for your supportive comments and inspiring suggestions that have helped much to improve the paper. I have tried to follow the suggestions closely in revising the text.

Firstly, I shortened the theoretical part of the paper and tried to smooth the exposition and give more motivation for the particular kind of time-frequency method used in the paper. I agree with the referee that the main contribution of the paper are the conclusions from my simulation analyses, so I accented this part of the paper more, especially in the abstract.

Further, I added new remarks in the parts that summarize the simulation studies. Firstly, I commented on an overall performance of an integer-valued version of the WPA-based estimator (equation (66*)) in the attached revised version) and gave a shorter (and corrected) description of the small scale simulation analysis concerning properties of the kernel estimates of the variance of the wavelet spectra estimators. Furthermore, I commented on the use of extrapolation techniques for nonstationary data with constant (stationary) delays. In my opinion, a good extrapolation method may serve this type of analysis better than differencing the series, especially if one is interested in examining deviation cycles.

In addition, I slightly supplemented the description of my empirical results and recomputed some of them, although to save space I did not change the sizes of the figures. As I would like also to provide my Matlab codes for all the computations performed in the paper, the reader will have the possibility to produce bigger figures by herself.

I am also sympathetic to the referee's suggestion to change the title – in the revised version I proposed a new one.

Finally, I have improved the language of the article.