Dear Professor Lalande

I hope you are doing well and everything is fine for you.

As you have been informed by the previous email, we have selected to approaches, i.e., K-mean and Deep Learning for Left Ventricle segmentation. We have already sent you our reference papers but we did not limit ourselves to those papers and we tried to investigate and figure out more by ourselves and readying our similar works.

Actually, we have tried to upload the raw code which is a combination of python and MATLAB codes but original project code is quite bulky (around 2.1GB in total) and we couldn't find any means to transfer to you online. So, we made a standalone *.exe files so that you can run our application and see the result. This file with dependencies is around 500MB and we are trying to transfer to you part by part.

Please make a folder on your computer and download all the zip files (four zip files) and extract them into your folder and then just run the *.exe. It should work without any trouble and hassle. If the application requested you to install MATALB run-time package please do it if you don't have on your PC installed. If you faced with any issue please inform us to give you further instruction.

If unluckily you couldn't run the code, we have prepared three sets of video which you can access through our YouTube channel. The link to access the videos and little description is as follows:

Part I: LV segmentation using K-means algorithm
https://youtu.be/cpiuUS-xZ0s

Part II: create training datasets using GUI interface and conduct training
https://youtu.be/AnhWERbO5_A

Part III: LV segmentation using deep learning algorithm
https://youtu.be/gI7ytPyNl0k

Code and project files: you will receive following links to download and put them together and ran them.

- The main application and exe file is in the first link (in this step you can run it because you need other dependencies)

https://we.tl/t-hwzvu8DfqN

- Deep learning weights (it is a single file but quite bulky and it is required when you are running deep learning algorithm)

https://we.tl/t-UvQtM3Lehn

- Original weight for architecture with multiple classes (we use this weight file and updated for new class, without this file you might face with error): the file is in process and you will receive separate email to download.
- Mask-RCNN library (please use only this library if you are using windows OS because it is complied for our code. If you download library from web it might not work properly). If you are using Linux please let us know to give your further instruction how to compile the library for Linux. The file is in process and you will receive separate email to download.

Aside from above demos and code, you will find a user guide and detail instruction of both method and a paper in IEEE transaction format to read and see our analysis, result and discussion. This paper is considered as our final report however it is almost half a paper over length comparing to your 6 pages limit, if you think it affects our final score please let us know to reduce the number of the pages to be in range.

We hope this work satisfies your requirement

Yours sincerely

Azadeh and Adeyemi