

Sprint1 Plan

1. Goal

For Sprint1, we want to create a product/function that will help the client read the DICOM file given by the client,

then compare it with the case values in the standard file, and finally return the pass/ Fail result.

The input of the product is

1. The DICOM file path that the client wants to validate;
2. Truth Table of the standard value file used for verification;
3. Case number in the Truth Table;

The output is

1. Pass/Fail that the DICOM file is consistent with the given case in the Truth table;
2. Some prompts, such as: Why is the result fail or pass.

The verification steps (overall) are:

1. extract params from the given DICOM file;
2. extract all the cases and parameters into memory from the given truth table path;
3. Verify the extracted parameter value against the value of the case, and return pass/fail;

For sprint1, our focus is on:

1. Extract and validate two parameters which are gantry Angle and SSD. In the first sprint, we didn't validate many parameters, mainly because we wanted to focus initially on the usability, scalability, and readability of our system, it is attainable for us without too much parameters to learn;
2. Make sure that our system is easy to use, which means that when we show how our system works, the client/user can clearly understand how to use our system/function at the first time;
3. The system is extensible, which means that we need to divide the system into separate modules (open and closed principles), such as: the extraction/validation of different parameters in different Python files, in the main file, with clear integration. Therefore, it is friendly to other developers to continue developing.
4. The system is readable, which means we need to add legible comments to the system and functions so that clients can use the system with little or no help from others.

If we achieve this goal, it will facilitate developers to extend our functions (extract and verify more parameters) during the Sprint2 and the subsequent development of other students in next semester.

2. Trello

You can go to [Trello](#) to see our detailed plan, which contains our current "doing, to do and Done "events and backlog for our product.

In Trello, we update these "doing, to do and Done " events. We update who is responsible for everything and estimate how long it will take to complete.

3.Sprint1 Product

visit [github](#) to look at our product.

We show our product in 25th Sep, The customer has approved our final product in sprint1, which means we can continue to work on this release in the next weeks.

Show about how to use our function in [Terms video](#)