HE labeling from non-contrast head CT v1

I) Information
Input: non-contrast head CT
Output: the number of patients that we do not need to check

II) Run the application on Linux
1. Download the file "HELabeling.zip"
2. Extract the file
3. Go to the folder: HELabeling
4. Run the command: ./HELabeling

II) Prepare Folder and CSV file

1. **Example data directory: Data**
- Data\CT: contains all file *.nii.gz
- Data\gt_masks\: contains all ICH segmentation groundtruth:
  *-label_bleeding.nii.gz.nii.gz
- Data\exampleCSV.csv
  filename_baseline,filename_followup,labelICH3000,labelICH6000,labelICH9000,labelICH12000
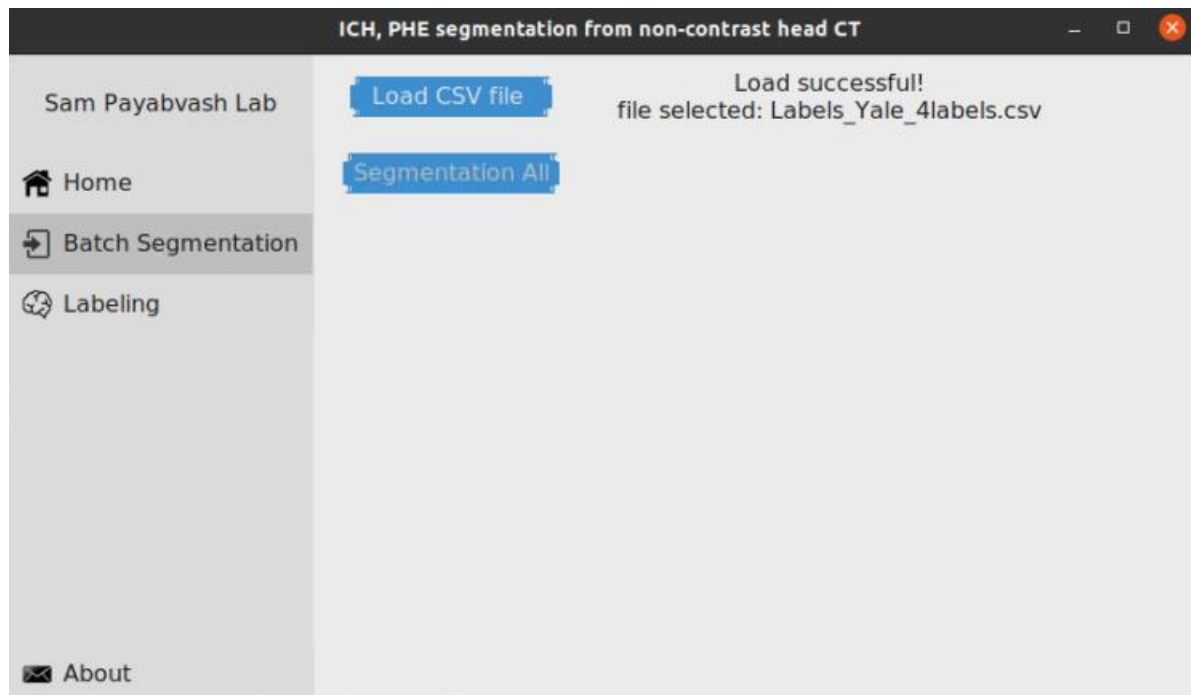 *606_E108122836,606_E108124200,0,0,0,0*

2. **Data\Labeling is the folder result after running all methods**
- Data\Labeling*.nii.gz: CT after registration to (128x128x128)
- Data\Labeling*_seg.nii.gz: mask segmentation using nnUNET after registration to (128x128x128)
- Data\Labeling*_gt.nii.gz: ground-truth after registration to (128x128x128)
- Dice.txt: result for segmentation
- 3000_unetr_0.68_0.0052_report.csv: report using method unetr with threshold 0.0052 have AUC=0.68 for HE volume>3000
  …….
- File heatmap: the number of patients and percentage of patients that we do not need to check

III) Using the application

Step 1. Segmentation
- Select "Batch_Segmentation"
- Select "Load CSV file" and browse to the file CSV
- Select "Segmentation All"

Step 2. Labeling
- Select "Labeling"
- Select "Load CSV file labeling": browse to the file .csv (similar file in segmentation)
- Select "HE Labeling method X"