# Weekly Diary

# Master thesis course in Computing Science **Pina Kolling**

Week 3	Introduction and first work on project plan
Week 4	Finish project plan, start setting up code on my computer
Week 5	First research on the topic, including finding literature, set up Git and LATEX for master thesis (on work laptop, my laptop and stationary pc), document execution of code
Week 6	Set up code on my computer and first familiarizing with codebase, finding literature, document execution of code
Week 7	Implementing, documenting the process and literature research
Week 8	Implementing, documenting the process and literature research and vacation with my grandmother (she turns 90 $\heartsuit$ ) so probably reduced work capacity
Week 9	Implementing, documenting the process and literature research, evaluating if it is possible to obtain colour-corrected video results using JIT and then specify or readjust the focus
Week 10	Implementing, documenting the process and literature research and creating slides for the midterm seminar
Week 11	Implementing, documenting the process and literature research, midterm seminar
Week 12	Implementing, documenting the process and literature research, search or implement offline colour correction software and other suitable solutions for comparison (if needed)
Week 13	Implementing, documenting the process and literature research
Week 14	Implementing, documenting the process and literature research
Week 15	Writing
Week 16	Writing
Week 17	Writing
Week 18	Writing
Week 19	Finalizing, reworking and applying feedback
Week 20	Hand in final version of the thesis
Week 21	Create Slides for the thesis seminar
Week 22	Thesis seminar (defence and opposition)
Week 23	Opponent thesis report

# 16.01.24, Tuesday

• First meeting at university

# 17.01.24, Wednesday

- Setting up file and git for weekly diary
- Writing first mail with topic specification to Vicenç Torra
- Keeping my supervisor at Codemill (Urban Söderberg) in the loop
- Begin with project plan (setting up the file, etc.)

#### 18.01.24, Thursday

- Getting a supervisor from university assigned (Cem Okulmus)
- Continue work on project plan:
  - Introduction
- First research on:
  - o Just-In-Time (JIT), WebRTC, h.264, Melt framework
  - Infrastructure model of the system

#### 19.01.24, Friday

- Continue work on project plan:
  - Problem formulation
  - $\circ$  Method
  - o Infrastructure model

#### 20.01.24, Saturday

- Continue work on project plan:
  - Evaluation methods
  - Self assessment
- Looking into previous master thesis that was written at Codemill

#### 22.01.24, Monday

- Set up git on other computer
- Continue work on project plan:
  - Resources
  - Read again and correct
  - o Deciding on a title
- Send projectplan to supervisor at Codemill (Urban Söderberg)
- Send projectplan to supervisor at university (Cem Okulmus)

### 23.01.24, Tuesday

- First meeting with supervisor at university (Cem Okulmus)
- Rework and additional info on project plan:
  - Change JIT definition
  - Add timeline
  - o Add challenges
- Add timeline weekly diary and adapt setup of weekly diary (counting in calendar weeks)

# 24.01.24, Wednesday

• Prepare laptop to set up code on it

#### 25.01.24, Thursday

• Setting up the code on my laptop at Codemill

(generating ssh key, cloning git repositories, installing node.js and docker, etc)

- o Problem: My RAM was not sufficient and the code could not be executed
- o Solution: Looking for a company laptop to execute the code

# 26.01.24, Friday

- Setting up the code on the new laptop at Codemill
  - Problem: Space in user name on the device which makes some paths not working
  - Solution: Setting up windows with a new user (to do)
  - o Info: The code has not been run on a windows system before

# 29.01.24, Monday

• Being sick ②

#### 30.01.24, Tuesday

• Being sick ©

#### 31.01.24, Wednesday

- Being sick ©
- Setting up new windows user
- Setting up code on new laptop (frontend running but problems with backend/docker container)
- Document execution of code:

#### Setting up the code

- Generate ssh key (ssh-keygen) and add to GitLab
- Clone git repositories (jit-webrtc and accurate-player-3-core)
- Install node.js and set path variables for npm (and yarn)
- Install and run docker
- Execute jit-webrtc code with command from README with docker/main/main.sh --threads 16 --port 8080 \$VIDEOFILE (not working!)
- Execute accurate player code (run npm install --force, npm install yarn and then npm start, resolve errors, fix dependenciy problems with npm audit fix --force (potentially twice))

#### 01.02.24, Thursday

- Being sick ©
- Installing slack
- Looking into the backend/docker problem
- Setting up WeeklyDiary git and tex file on Codemill-laptop

#### 02.02.24, Friday

- Being sick ©
- Trying to solve the docker/backend problem (still unsolved)
- Setting up git and tex file for master thesis on stationary PC
- Creating title page
- Structure for thesis
- First research and adding of references
- First writing in introduction

# 03.02.24, Saturday

- $\bullet$  Being sick  $\odot$
- Trying to solve the docker/backend problem (still unsolved):
  - $\circ\,$  Inspecting main.sh script file
  - $\circ\,$  Inspecting docker problems regarding windows
  - docker-run.sh not found or opened... Changing the path does not seem to help and the file does exist (feedback: no such file or directory)
  - Setting up python

# 05.02.24, Monday

- Run backend/docker (finally!):
  - Make changes in main.sh (last line): remove --device /dev/fuse and change path to //opt/jit-webrtc/jit/docker-run.sh
- Problem: Connectivity issues between browser and docker
- Solution: Installing Linux and not running it under Windows

# 06.02.24, Tuesday

- Installing Linux Ubuntu 22.04 (not booting after updates)
- Installing Linux Ubuntu 23.10