



Norwegian University of
Science and Technology

LAB SETUP

TTM4205 – Live Demo + Help

Caroline Sandsbråten

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Contents

Linux (and Mac, kind of)

Windows

Introduction

- ▶ There might be some problems with the paths for binaries. Let me know and I will help you and update the .zip folder.
- ▶ I will be using Linux, but I will try to help you with Windows and Mac as well.
- ▶ Windows is the easiest and quickest. Follow the instructions in the installation.md file.
- ▶ I have no experience with Mac, but I will help you.

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Prerequisites

- ▶ I don't personally have a Mac, so let's figure that one out together.
- ▶ Nice to have: Python version manager (pyenv OR anaconda).
- ▶ Compilers and other packages
- ▶ Git

Anaconda (Miniforge)

```
curl -L -O "https://github.com/conda-forge/miniforge/  
releases/latest/download/Miniforge3-$(uname)-$(uname -m) .  
sh"  
bash Miniforge3-$(uname)-$(uname -m) .sh
```

Installing packages

```
sudo apt update && sudo apt upgrade
```

```
sudo apt install build-essential gdb lcov pkg-config \  
libbz2-dev libffi-dev libgdbm-dev libgdbm-compat-dev \  
liblzma-dev \  
libncurses5-dev libreadline6-dev libsqlite3-dev libssl- \  
dev \  
lzma lzma-dev tk-dev uuid-dev zlib1g-dev curl
```

```
sudo apt install libusb-dev make git avr-libc gcc-avr \  
gcc-arm-none-eabi libusb-1.0-0-dev usbutils
```

Chipwhisperer

```
cd ~/
git clone https://github.com/newaetech/chipwhisperer
cd chipwhisperer
git submodule update --init jupyter # grab Jupyter notebook
  tutorials

sudo cp hardware/50-newae.rules /etc/udev/rules.d/50-newae.
  rules
sudo udevadm control --reload-rules

sudo groupadd -f chipwhisperer
sudo usermod -aG chipwhisperer $USER
sudo usermod -aG plugdev $USER
```


Python packages

```
conda create -n chipwhisperer --python=3.9.5 ipython  
conda activate chipwhisperer  
pip install -r requirements.txt # from chipwhisperer/jupyter  
pip install chipwhisperer
```

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Prerequisites

See `installation.md` on the course page.

Questions?