

PrairieLearn Set-Up Guide

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Installation Instructions

Linux through Virtual Box

- Install Oracle VM virtual box (install link [here](#))
- In the setup- make sure you select the type field as Linux, and select the version to be Ubuntu 22.04 LTS (Jammy Jellyfish)
- Go through the setup steps with launching the VM.
- Open up the terminal
- After setup steps, install docker, this [link](#) takes you to the correct commands to input into the terminal, or simply input these commands:
 - `sudo apt-get update`
 - `sudo apt-get install ca-certificates curl`
 - `sudo install -m 0755 -d /etc/apt/keyrings`
 - `sudo curl -fsSL https://download.docker.com/linux/ubuntu/gpg -o /etc/apt/keyrings/docker.asc`
 - `sudo chmod a+r /etc/apt/keyrings/docker.asc`
 - `echo \ "deb [arch=$(dpkg --print-architecture) signed-by=/etc/apt/keyrings/docker.asc] https://download.docker.com/linux/ubuntu \ $(. /etc/os-release && echo "$VERSION_CODENAME") stable" | \`
 - `sudo tee /etc/apt/sources.list.d/docker.list > /dev/null`
 - `sudo apt-get update`

Windows and WSL 2

You can follow these steps linked [here](#), or follow the instructions below:

- Open windows command prompt
- Type `wsl --install`
- Type `wsl --set-default-version 2`
 - This ensures you have WSL 2
- Type `wsl --set-default Ubuntu-22.04`
- Type 'Ubuntu-22.04' to run the linux terminal
- Now you are in your own linux terminal, so from here, we need to install docker
- After setup steps, install docker, this [link](#) takes you to the correct commands to input into the terminal, or simply input these commands:
 - `sudo apt-get update`
 - `sudo apt-get install ca-certificates curl`
 - `sudo install -m 0755 -d /etc/apt/keyrings`
 - `sudo curl -fsSL https://download.docker.com/linux/ubuntu/gpg -o /etc/apt/keyrings/docker.asc`
 - `sudo chmod a+r /etc/apt/keyrings/docker.asc`
 - `echo \ "deb [arch=$(dpkg --print-architecture) signed-by=/etc/apt/keyrings/docker.asc] https://download.docker.com/linux/ubuntu \ $(. /etc/os-release && echo "$VERSION_CODENAME") stable" | \`

- `sudo tee /etc/apt/sources.list.d/docker.list > /dev/null`
- `sudo apt-get update`

Course Repository

Our sdmay24-33 CPRE288 Course

In order to locally run the CPRE288 course we have developed, go to our git linked [here](#).

- Open up the terminal
- In the terminal, type 'git clone <https://git.ece.iastate.edu/sd/sdmay24-33.git>'
 - If you want any other specific course, simply replace the link with the Clone with HTTPS link for the desired git repository.
- In the root directory, create a folder called `pl_ag_jobs`
- Follow the instructions to Run the course

Personal Custom PrairieLearn Course

In order to run a course locally that is your own, make a folder that will contain the course files. If you want the course to be a git repository, make the git repository, then clone the files through the following commands:

- Git clone (INSERT CLONE WITH HTTPS LINK HERE)
 - Replace with the copied Clone with HTTPS link from the git repository
- Follow instructions to run the course

Running Instructions

PrairieLearn Dev's Example Course

If you want to run a basic course that the PrairieLearn developers have made, simply run the following command:

```
sudo docker run -it --rm -p 3000:3000 prairielearn/prairielearn
```

Doing this will start their course, and going to the link <http://localhost:3000> will pull up the site. Hitting Load From Disk on the top right loads the files for you to mess around with.

Sdmay24-33's Course

If you want to run our group's CPRE288 course, after setting up everything from before, run the following command:

```
sudo docker run -it --rm -p 3000:3000 -v /var/run/docker.sock:/var/run/docker.sock -v $HOME/pl_ag_jobs:/jobs -v $HOME/sdmay24-33:/course -e HOST_JOBS_DIR=$HOME/pl_ag_jobs prairielearn/prairielearn
```

The reason our command is longer is the different docker containers we use for the C compiler and autograder. If the project is cloned correctly, then hitting load from disk after going to the link <http://localhost:3000> will show the course instance of CPR E 288: sdmay24-33.

Personal Course

To run your own custom course, run the following command:

```
docker run -it --rm -p 3000:3000 -v $HOME/COURSE_DIRECTORY:/course prairielearn/prairielearn
```

You will want to replace COURSE_DIRECTORY with the name of the directory that your course is stored in, that way the files will load correctly when hitting Load From Disk on the top right.

Resources

PrairieLearn Installation Guide:

<https://prairielearn.readthedocs.io/en/latest/installing/>

Sdmay24-33's CPRE 288 Course Git Repository:

<https://git.ece.iastate.edu/sd/sdmay24-33>

Docker Installation with Ubuntu:

<https://docs.docker.com/engine/install/ubuntu/>

Installing Linux on Windows with WSL:

<https://learn.microsoft.com/en-us/windows/wsl/install>

Oracle VirtualBox Download:

<https://www.virtualbox.org/wiki/Downloads>