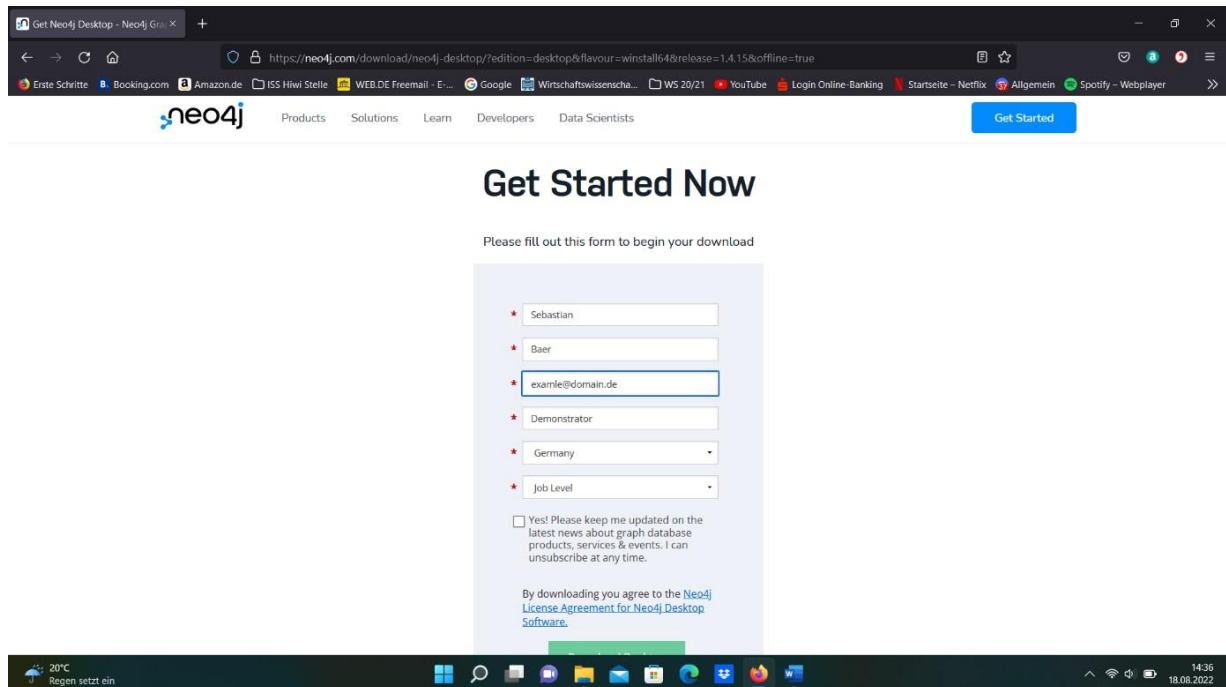


# Installation Guide

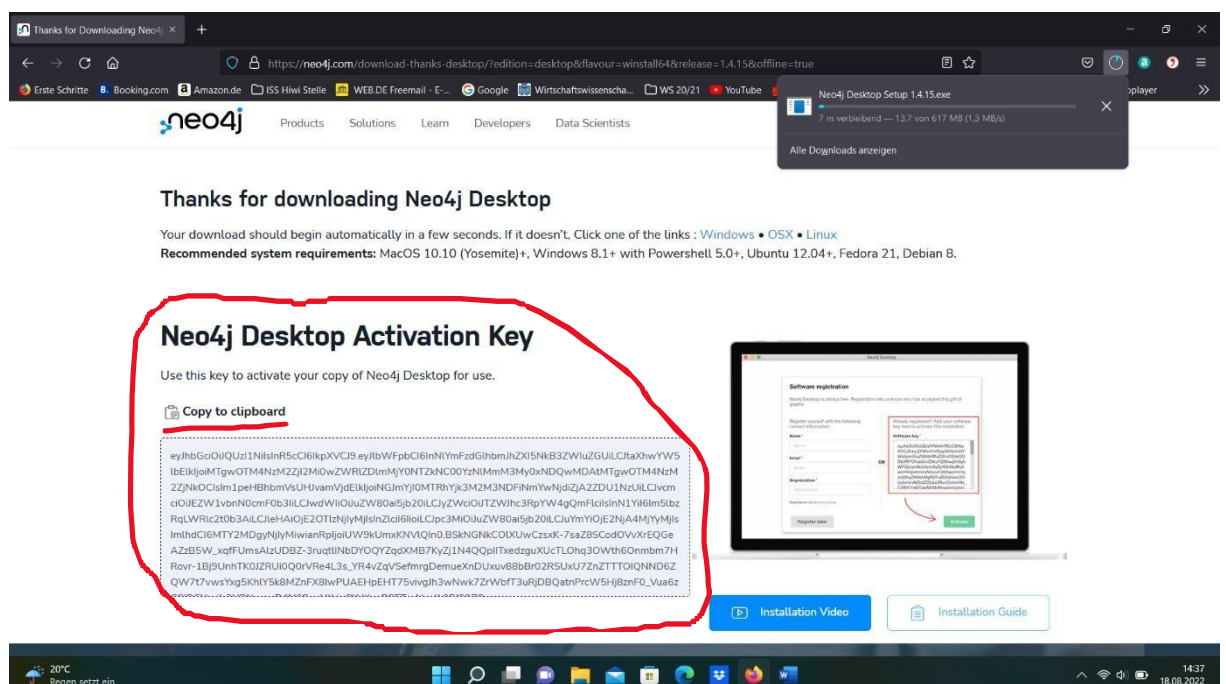
## 1. Install your Local Neo4j – Desktop Instance

Follow the link: <https://neo4j.com/download/> and click on the blue button named „Download

Another browser tab should open:

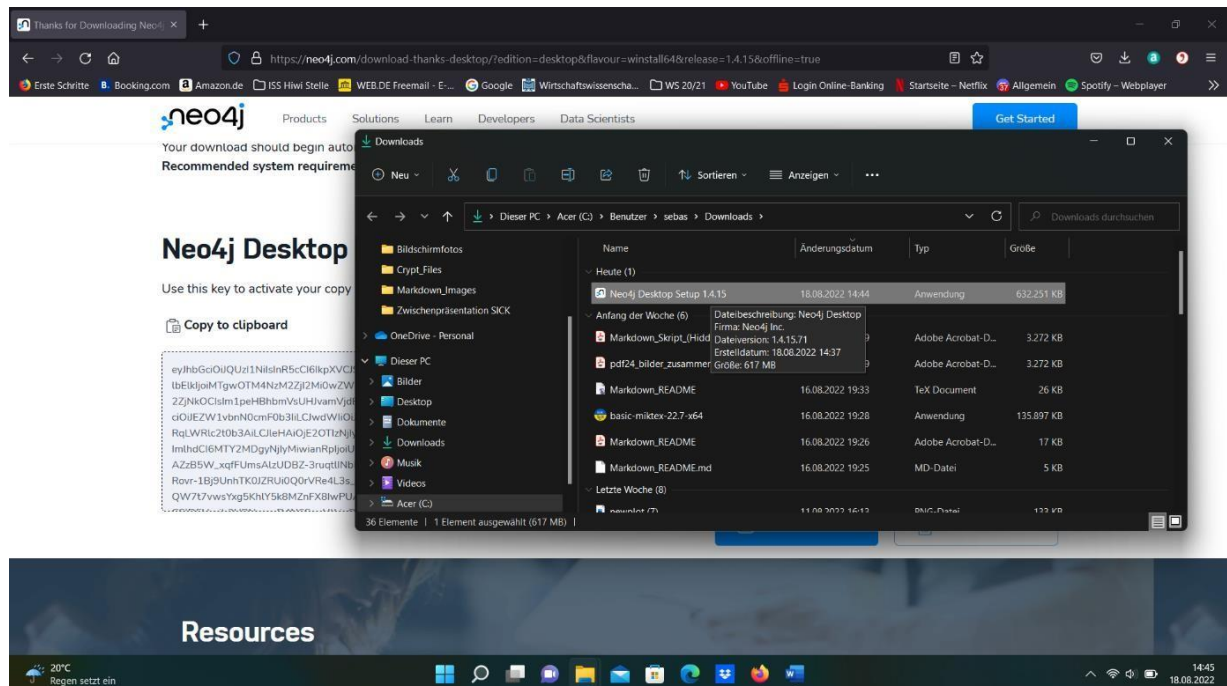


Please fill out this form and then click on the button „Download“. You will be redirected to another page and the download of the Neo4j Setup should start.

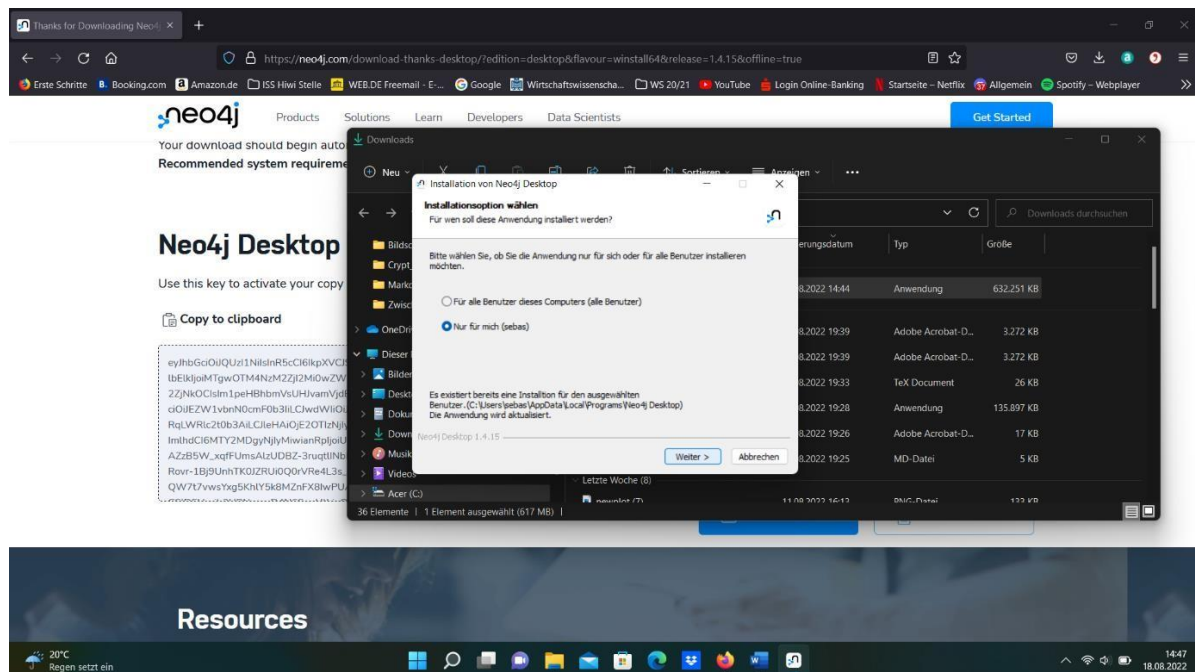


On the new page they will show an activation key. Don't close the window while installing of Neo4j Desktop is not finished and click on „Copy to clipboard“.

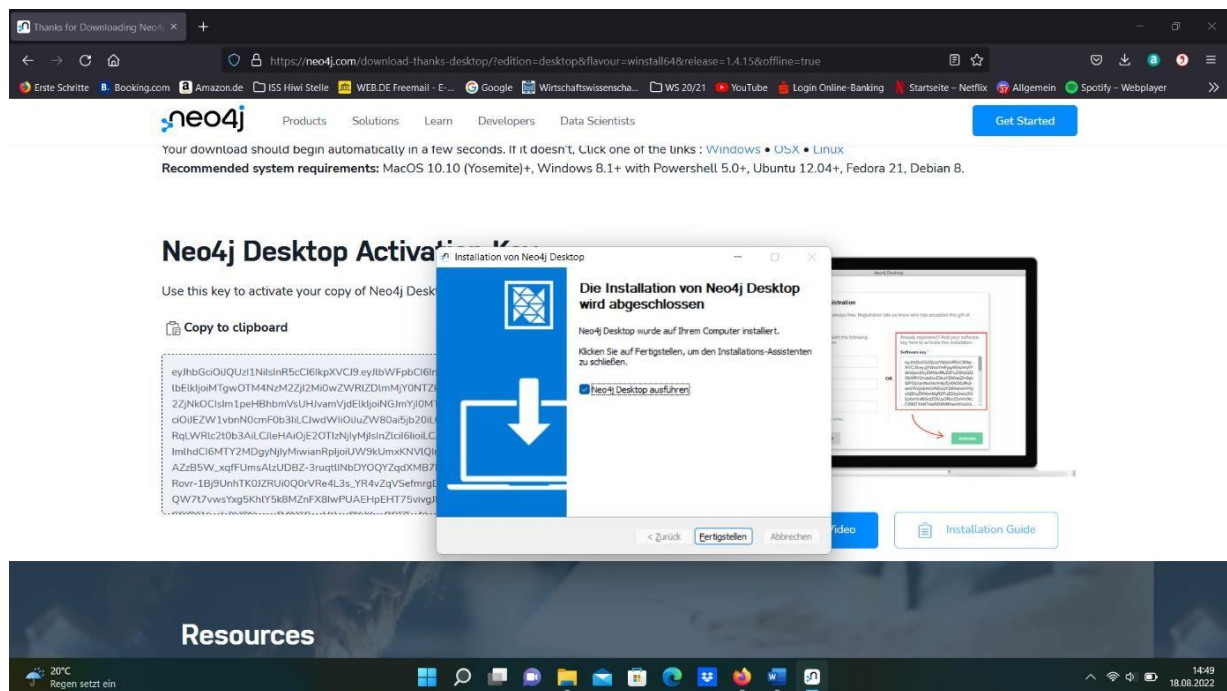
Once the download is finished double-click on the Neo4j Setup



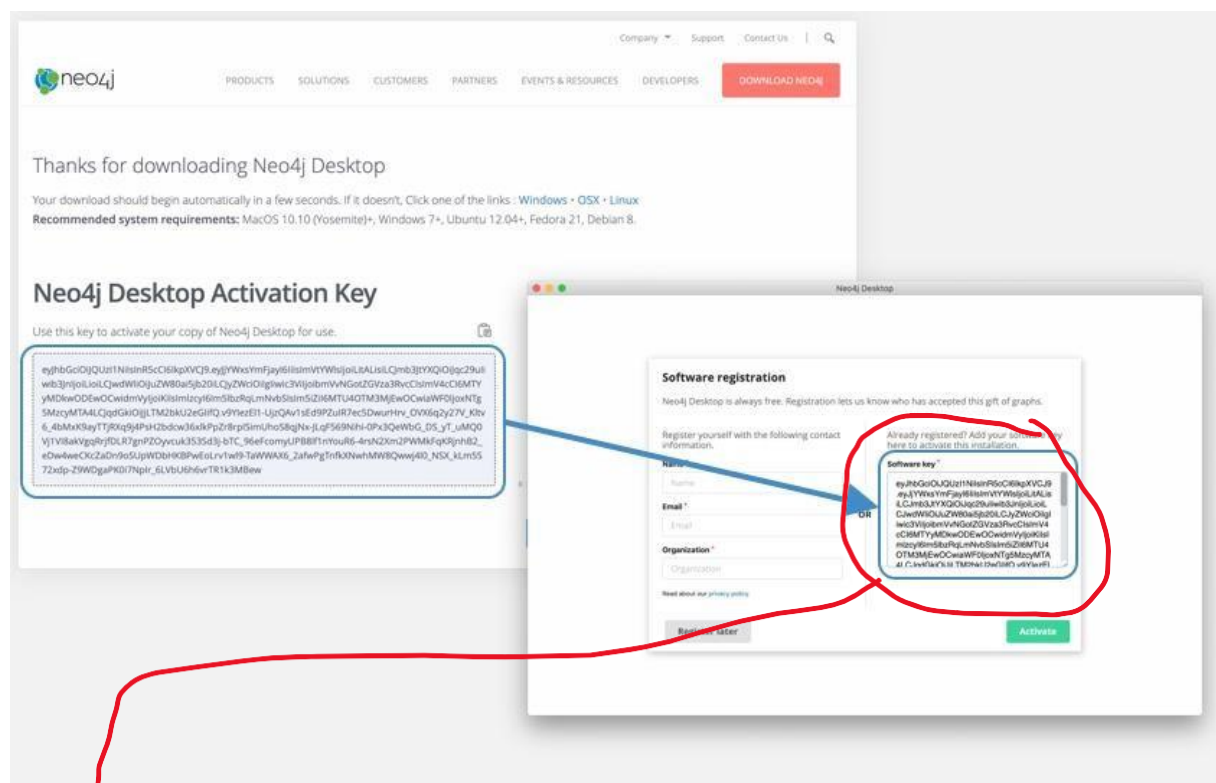
Follow the instructions of the Neo4j Desktop: No changes has to be made: You can click on „Weiter“ and „Install“



If everything worked well a small window should pop-up: Click on „Fertigstellen“

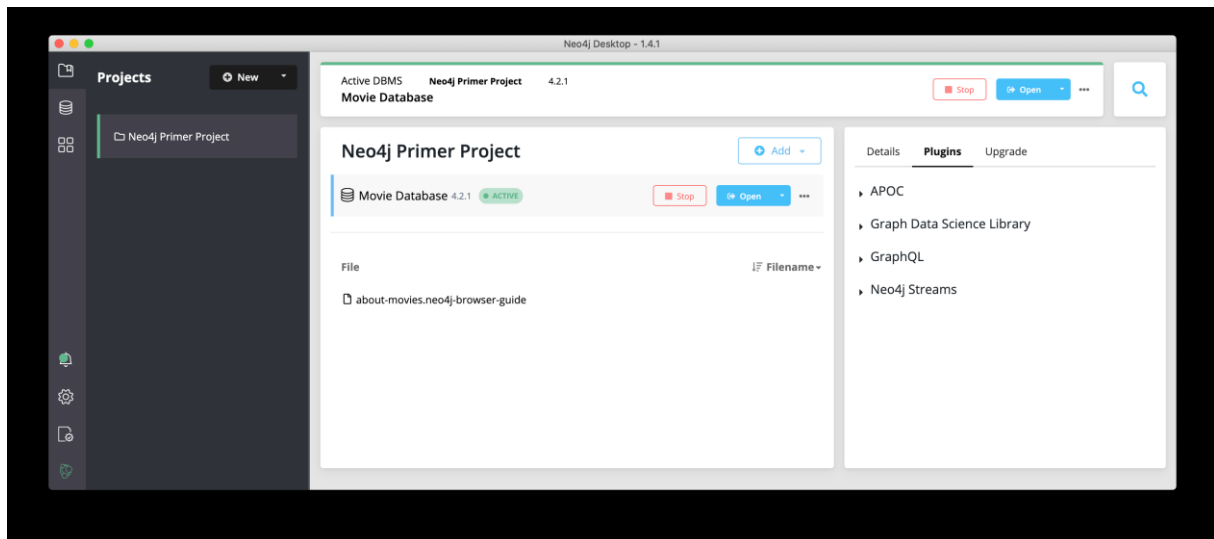


The Neo4j Desktop Instance should be working: The instance window will be the follows.

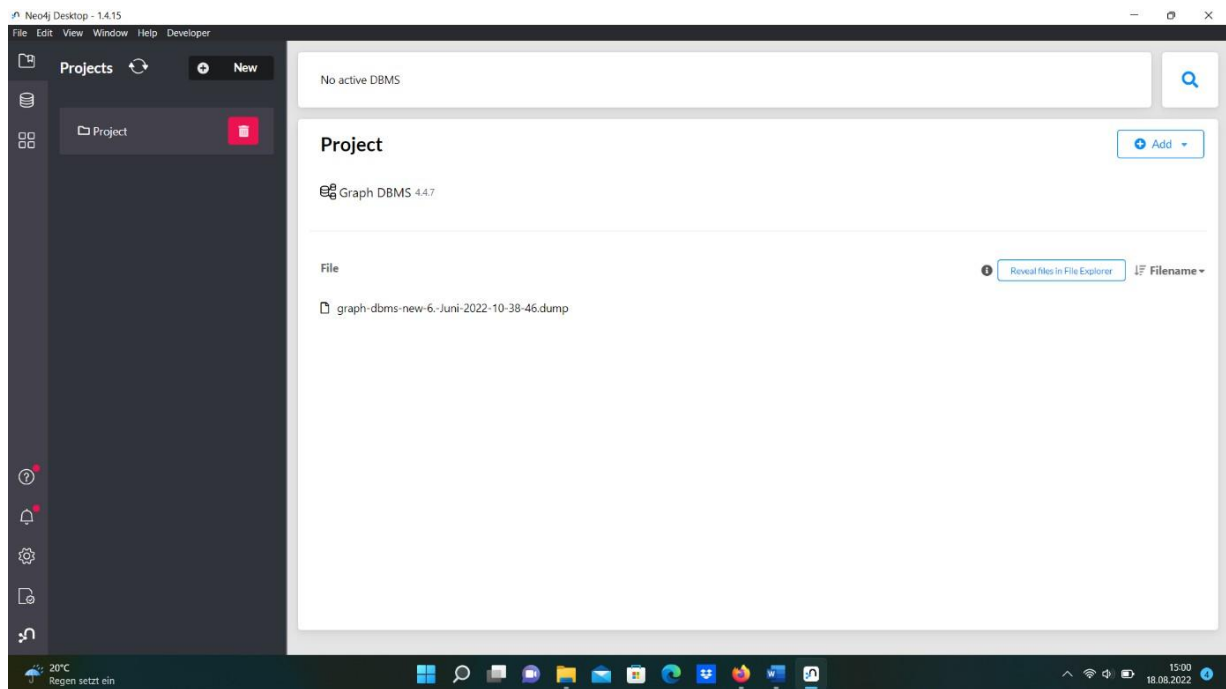


Do you remember on the Neo4j Desktop Activation Key? Please fill this key into the right field and click on „Activate“.

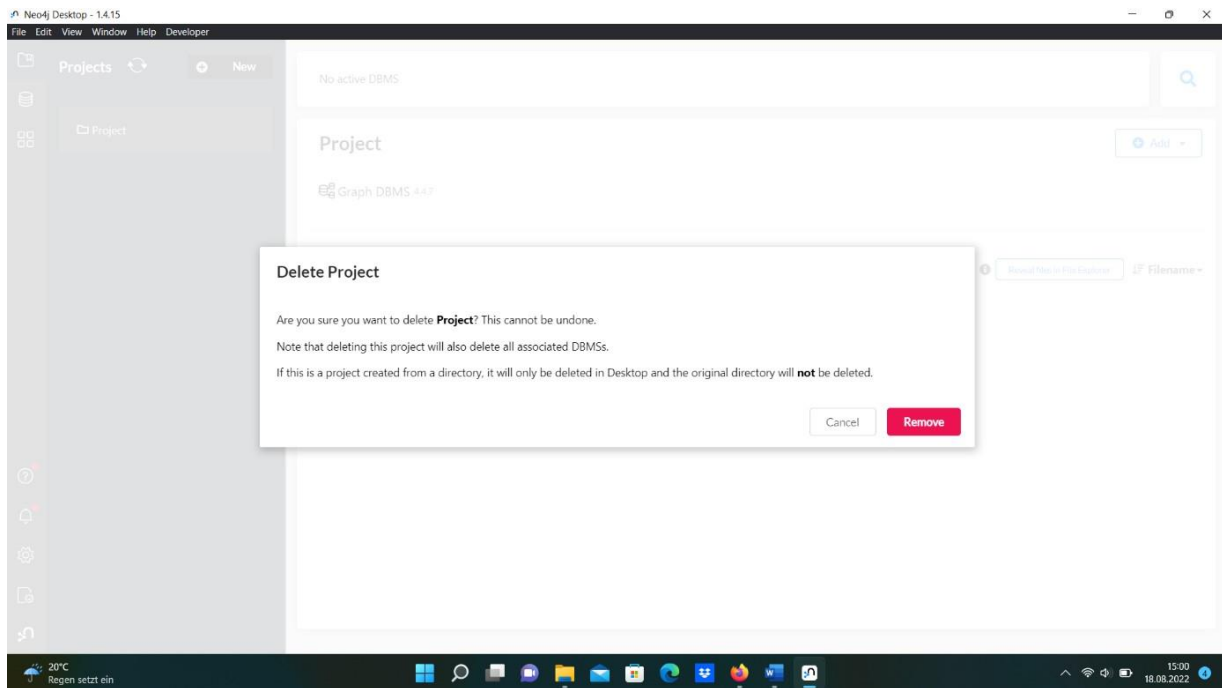
Once the Neo4j Desktop Instance is loading you will find a window like ...



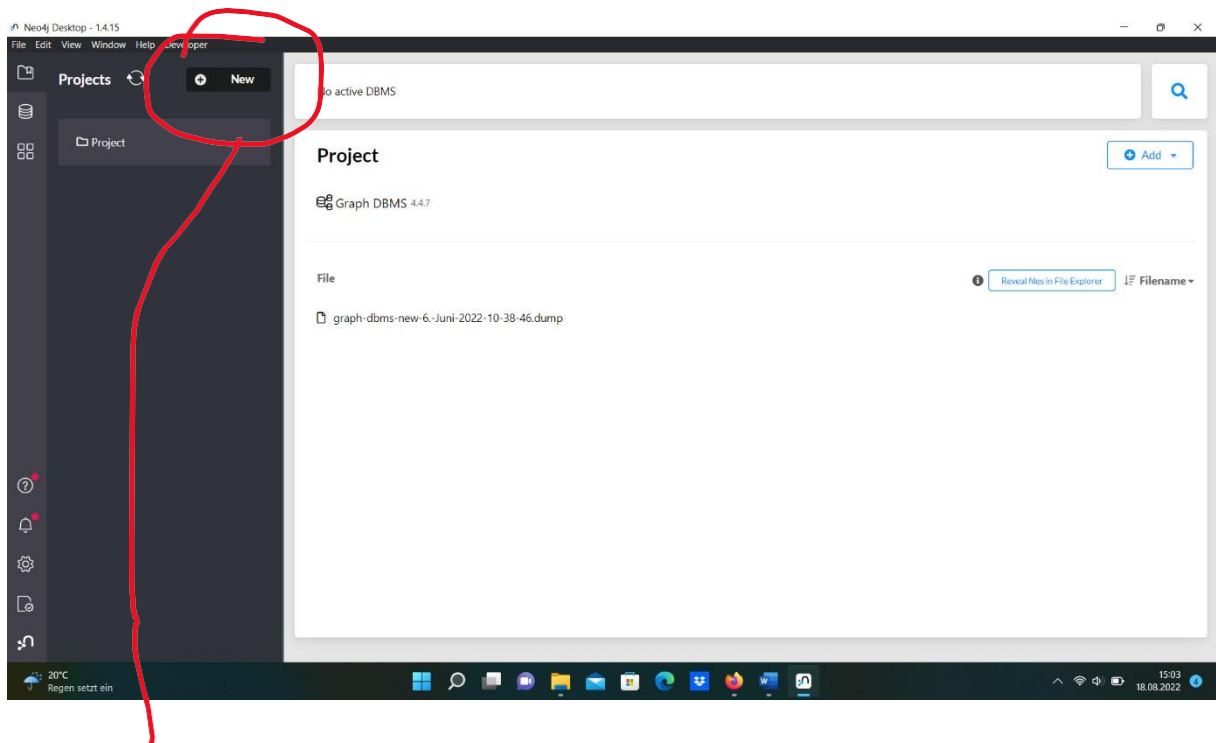
There is already a project called „Movie Database“ or „Movie DB“. Don't worry about this database, we don't need this DB, just remove this project



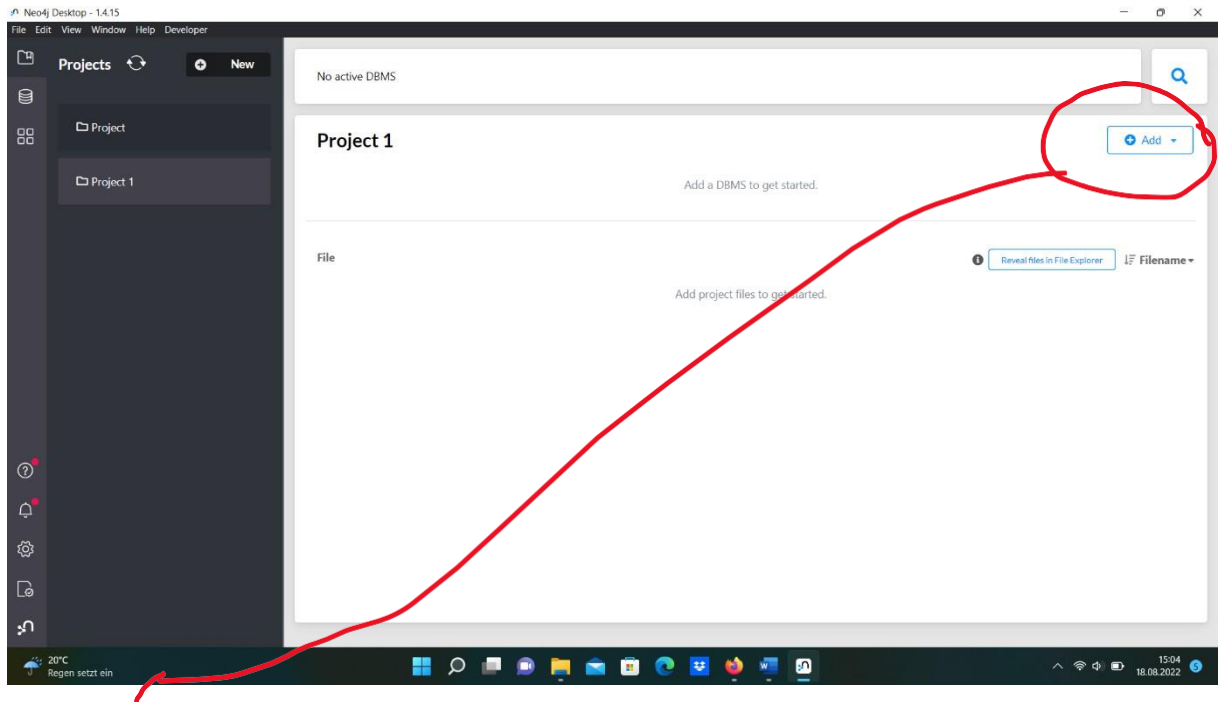
On the left side you find your current projects, just hover with your mouse over the right corner of your project tab and click on the red bin.



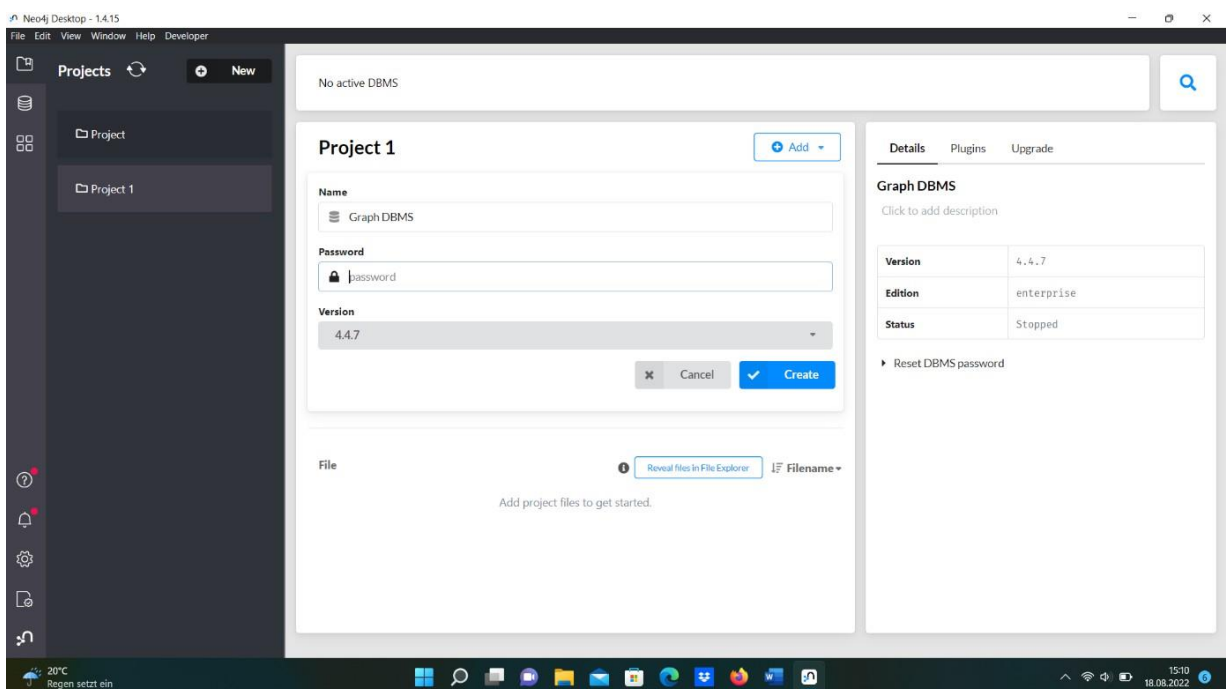
They will ask you if you are sure that you delete this project. Click on remove, no worries we don't need the „Movie DB“. And furthermore we will create our own project now.



Click on the „New“- Button and then on „Create a Project“. A new project should be created.

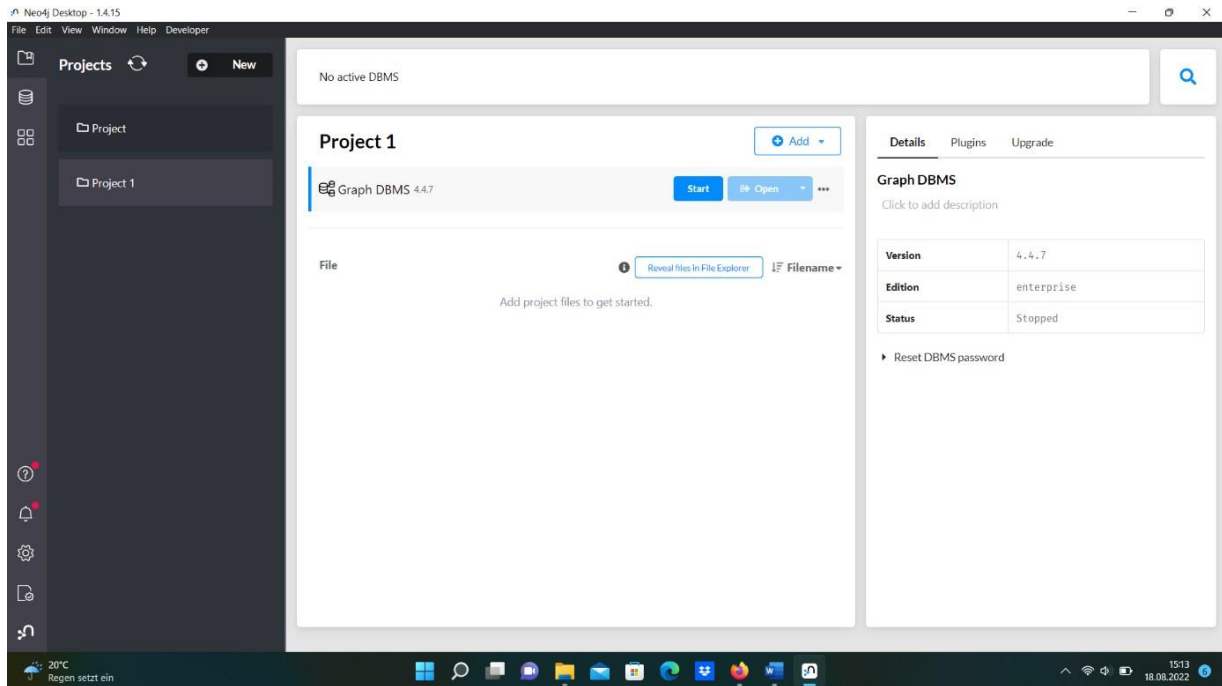


In your new project click on this blue „Add“-button and then on „Local DBMS“ to add a new DBMS (Database Management System). A new window should pop-up.

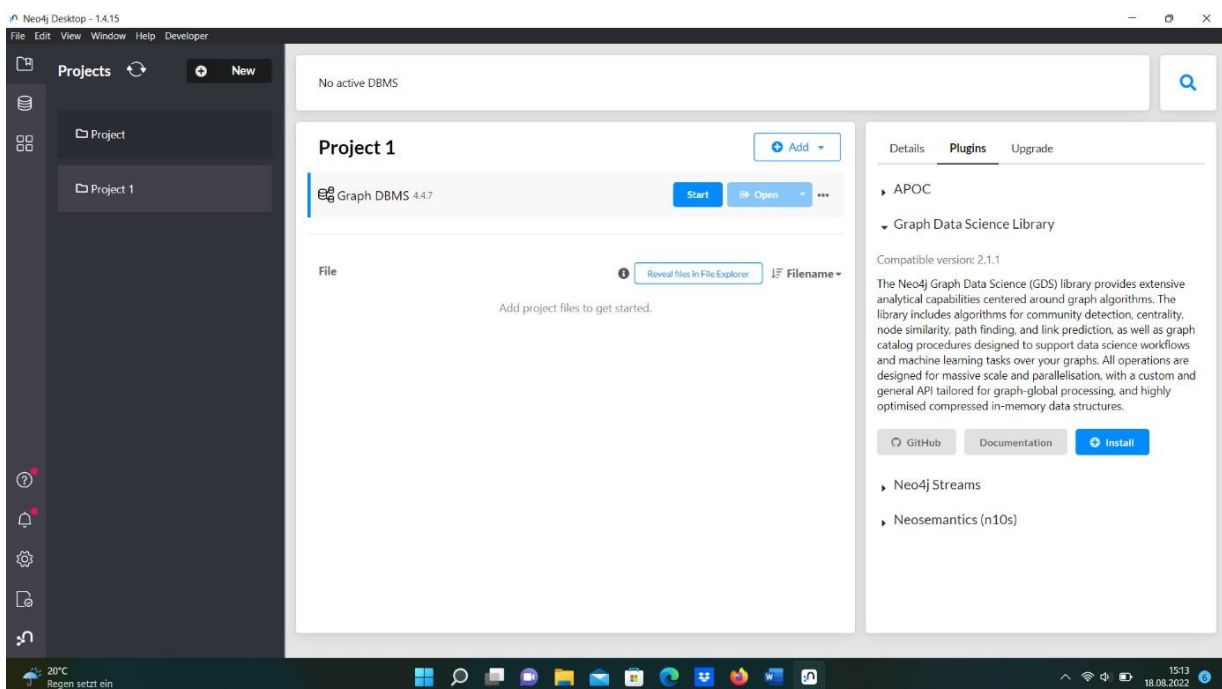


The only thing you should have to do is to type as password: password. And then click on create. (You need a password and for that it is easier to be simple).





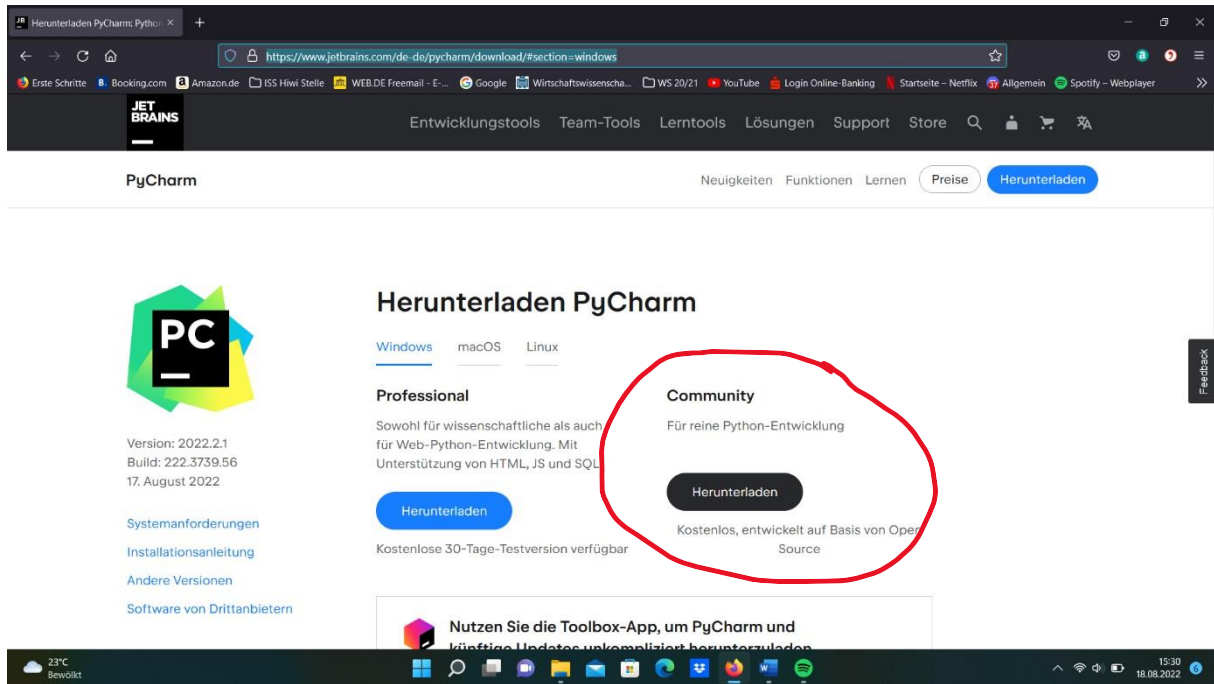
Congratulations you just have created your new Graph database. Don't forget to activate your database before starting the Hidden Problem Detector (further instructions please see the Quick-Start Guide). But there is one last thing to do:



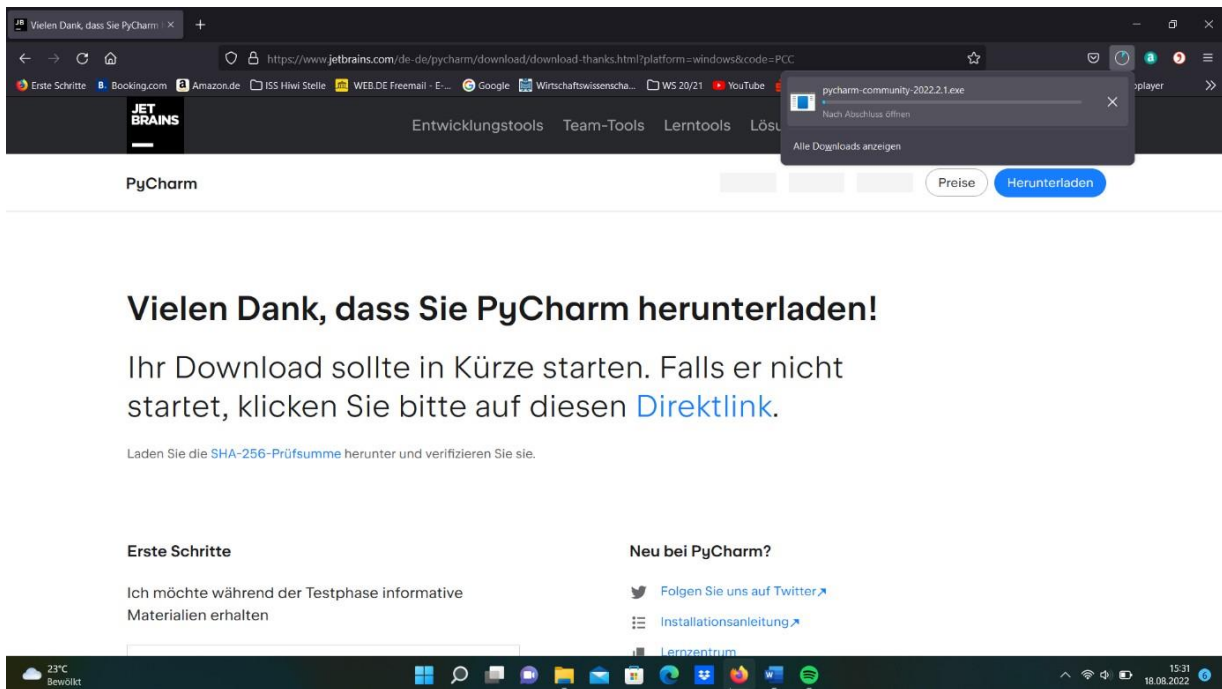
Click on your Graph DBMS and a window on the right should pop-up. You can find a plugin named „Graph Data Science Library“ please install this plugin. In order to do so, click on the blue install button. After the installation has finished you are now finished with the installation of your personal Neo4j Desktop Instance. Congratulations!

## 2. Set-up the Development Environment

Please follow the link <https://www.jetbrains.com/de-de/pycharm/download/#section=windows> and download the development environment „PyCharm Community“ (principal you can use the development environment you want but I will explain the installation on the example of „PyCharm Community“).

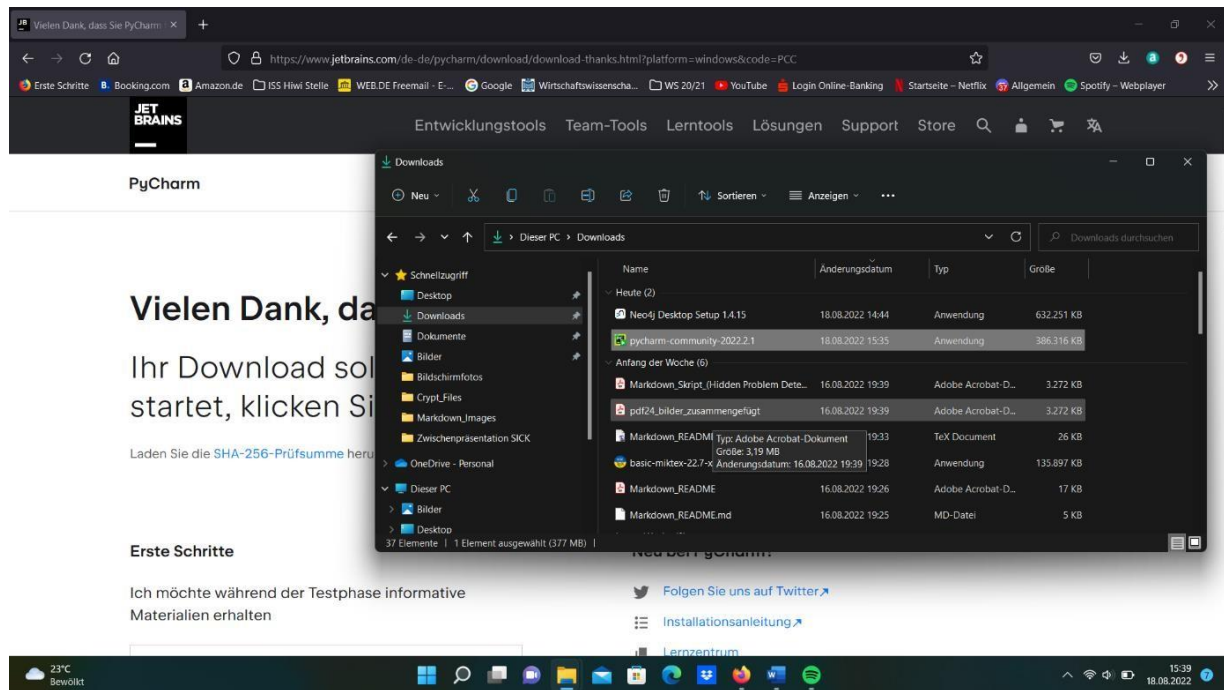


Click on the grey „Herunterladen“ – Button.

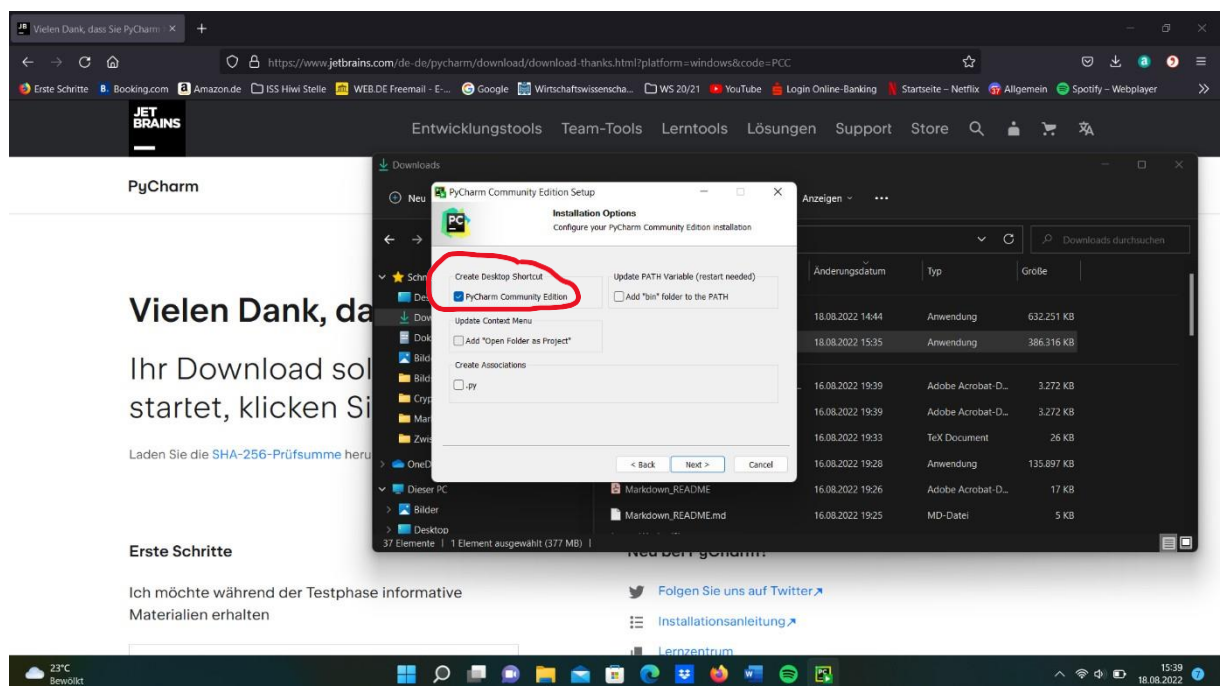


The download of the PyCharm-Setup Application should start immediately.

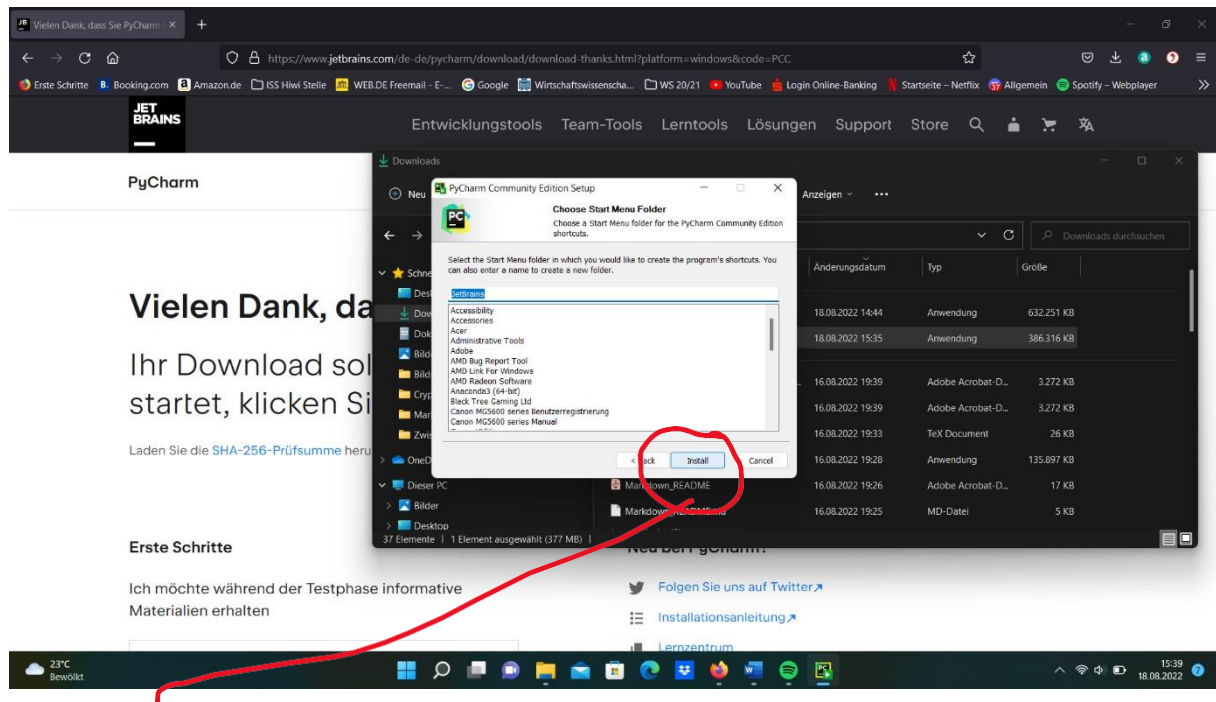




Double-click on the Pycharm Setup Application and follow the instructions. There are no changes to made, with only one exception ...



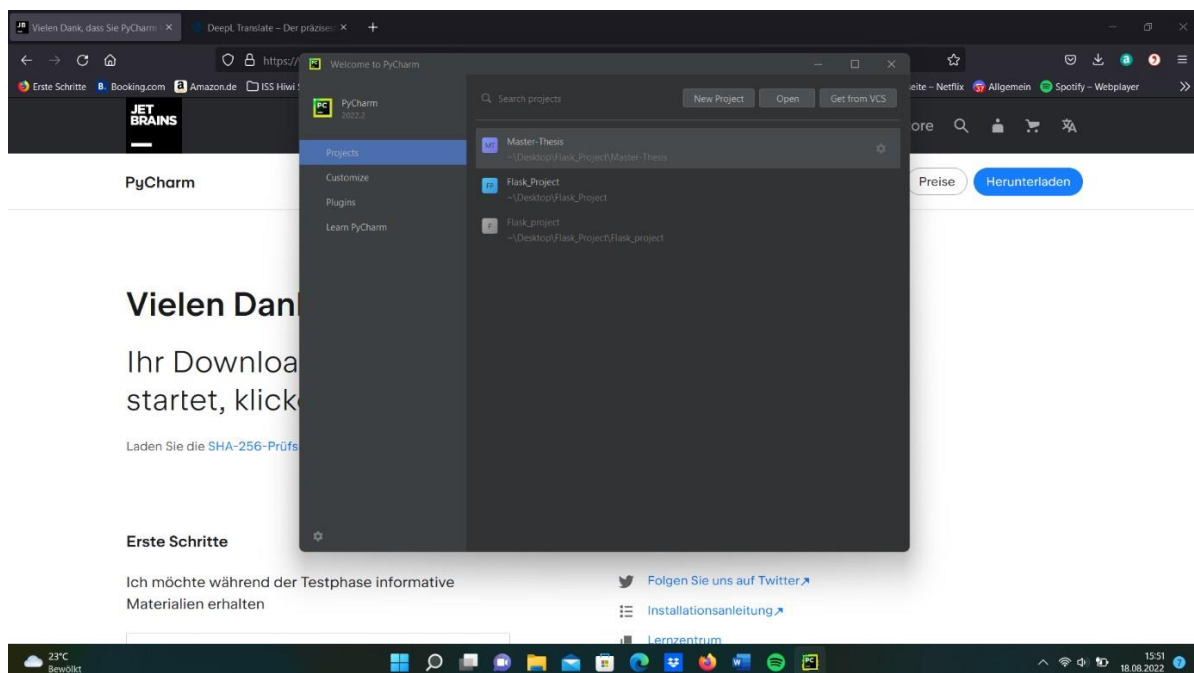
There should be an option to create a desktop shortcut. I prefer that such a shortcut is created, but it is not mandatory to have one. You can clicking on „Next“ and the following window should open.



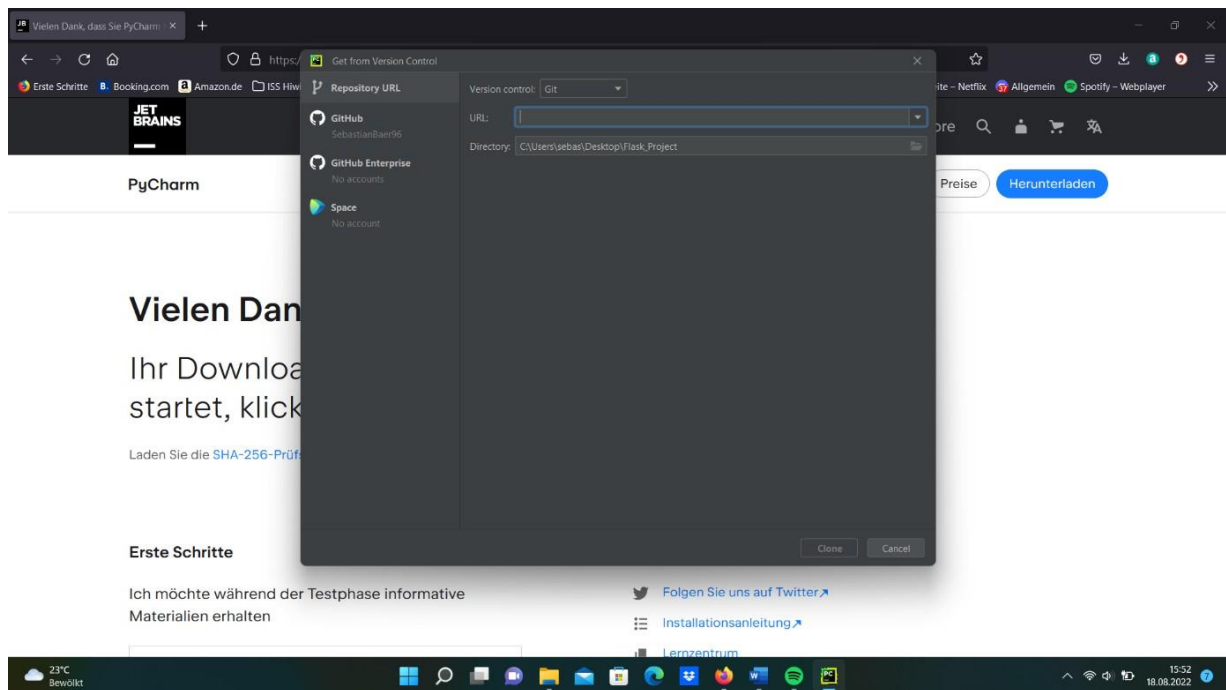
Click on Install. And the installation of your development environment should be started.



In the case you created a desktop shortcut please double-click on the „PyCharm Community“ Symbol on your Desktop otherwise search the application on your computer and start the development environment.



You should see a window like this. We getting our repository from Git-Hub so please ensure that Git-Hub is installed and click on the button "Get from VCS".



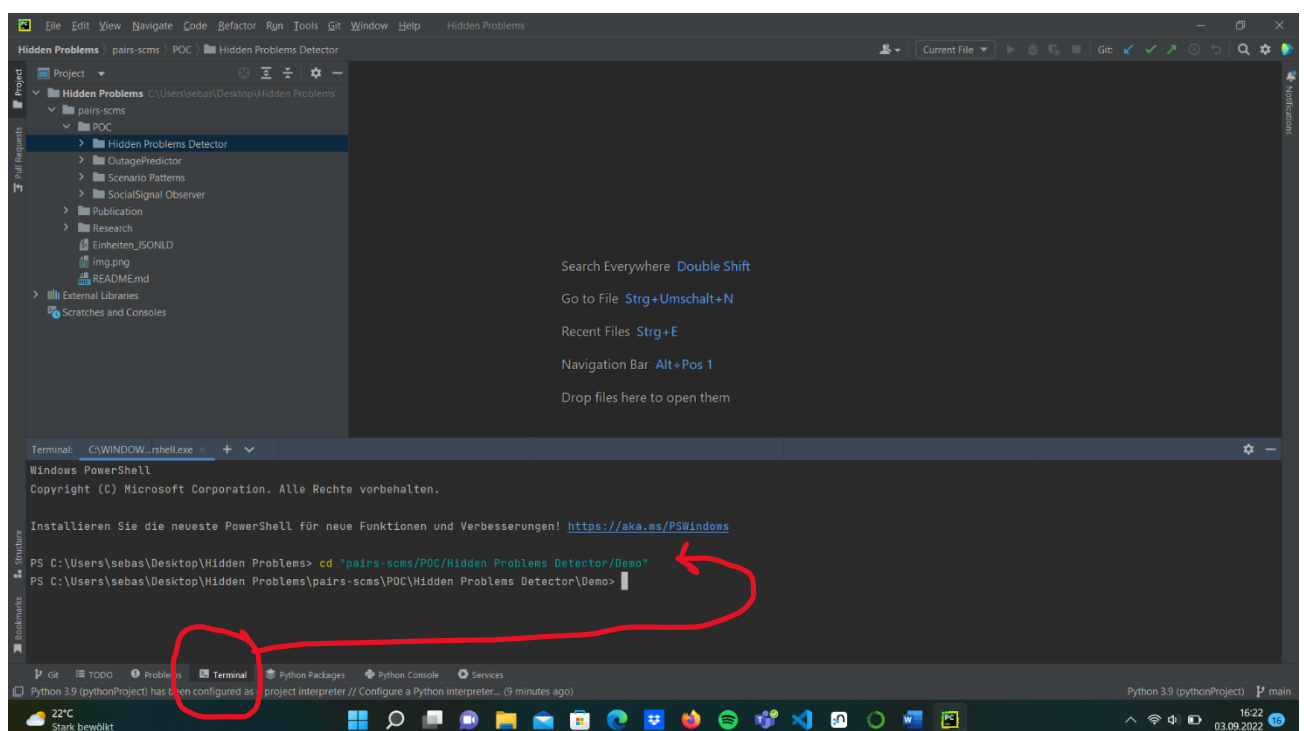
PyCharm will ask you for an URL to clone the repository. Please type:

<https://github.com/InformationServiceSystems/pairs-scms> in the URL field and click on the „Clone“ button. While cloning this repository Git-Hub demands that you log-in with your Git-Hub Account. It is mandatory that your Git-Hub Account is a „Collaborator“, ask Sebastian Baer so that you are added to this repository, otherwise the cloning of this repository will fail.

Let us assume that you successfully cloned the repository. A window like the following should open.

First, navigate to the “Hidden Problems Navigator”: type in your terminal the following commands:

`cd "pairs-scms/POC/Hidden Problems Detector/Demo"`





Type the command in "Terminal"

Before we can start we have to install and activate an virtual environment. Please type the following commands in the Terminal:

1. `python -m venv venv`
2. `venv/Scripts/activate`

```
File Edit View Navigate Code Refactor Run Tools Git Window Help Hidden Problems
Hidden Problems pairs-scms POC Hidden Problems Detector Demo venv
Project
  Hidden Problems C:\Users\sebas\Desktop\Hidden Problems
    pairs-scms
      POC
        Hidden Problems Detector
          Demo
            files
            Markdown_Images
            modules
            octopart_data
            static
            templates
            venv
              include
              Lib
              Scripts
              pyvenv.cfg
            .gitignore
            app.py
            Installation Guide.pdf
            modul
            Quick-Start Guide.pdf
Search Everywhere Double Shift
Go to File Strg+Umschalt+N
Recent Files Strg+E
Navigation Bar Alt+Pos 1
Drop files here to open them
Terminal: C:\WINDOWS\system32\cmd.exe
Windows PowerShell
Copyright (C) Microsoft Corporation. Alle Rechte vorbehalten.

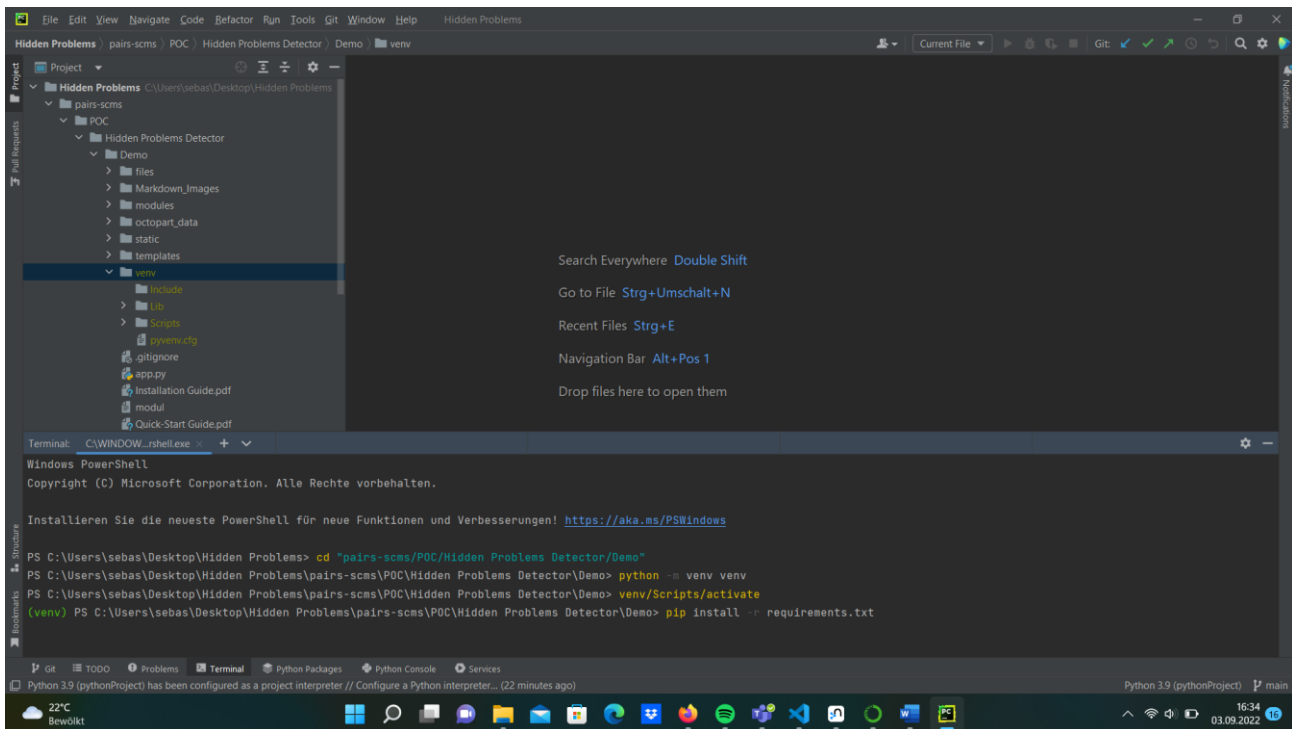
Installieren Sie die neueste PowerShell für neue Funktionen und Verbesserungen! https://aka.ms/PSWindows

PS C:\Users\sebas\Desktop\Hidden Problems> cd "pairs-scms\POC\Hidden Problems Detector\Demo"
PS C:\Users\sebas\Desktop\Hidden Problems\pairs-scms\POC\Hidden Problems Detector\Demo> python -m venv venv
PS C:\Users\sebas\Desktop\Hidden Problems\pairs-scms\POC\Hidden Problems Detector\Demo> venv\Scripts\activate
(venv) PS C:\Users\sebas\Desktop\Hidden Problems\pairs-scms\POC\Hidden Problems Detector\Demo>
Python 3.9 (pythonProject) main
```

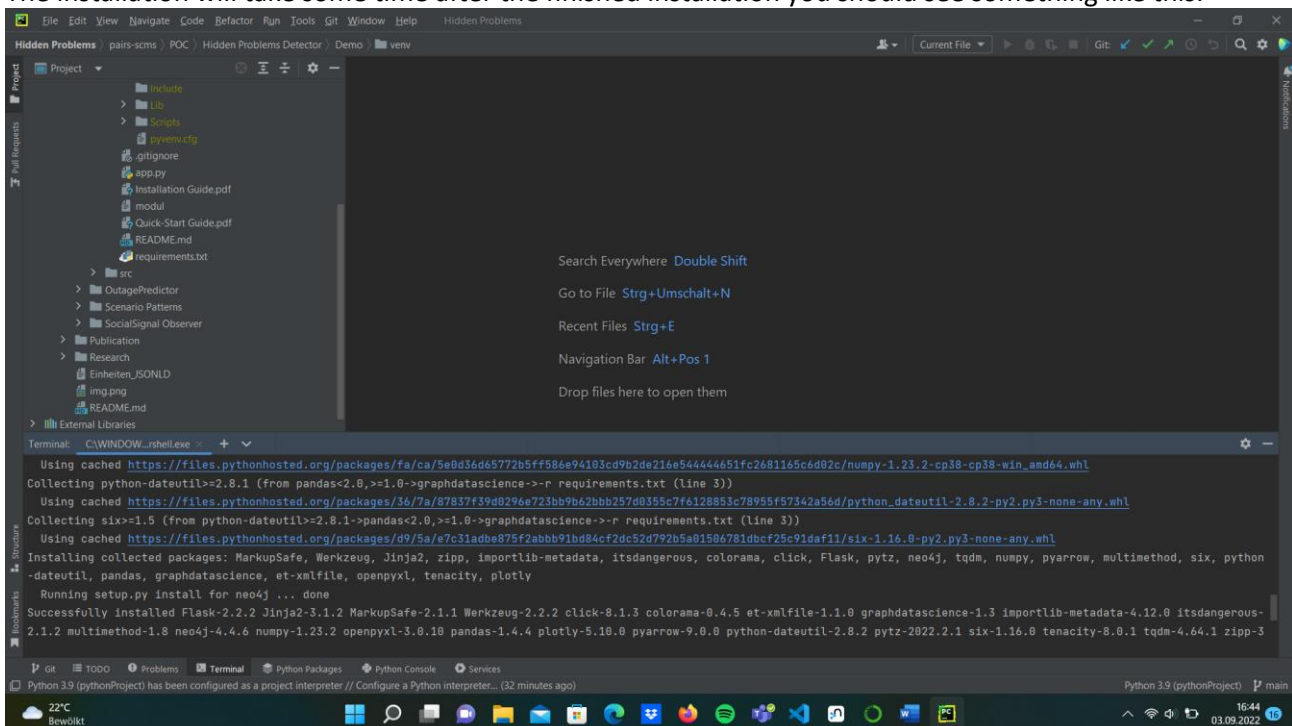
Are your virtual environment is active,  
you see the small "(venv)" bracket for  
your terminal path

In your next step you have to install the necessary libraries: Please type the following command in your “Terminal”:

`pip install -r requirements.txt`



The installation will take some time after the finished installation you should see something like this:



You have now successfully prepared everything to start the “Hidden Problems Detector”. For further instructions how to start the “Hidden Problems Detector” please read the Quick-Start-Guide.