

Create a conda virtual environment for RSE

A quick installation guide for the VUB course "Remote Sensing of the Environment"

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This document will guide you to create a conda virtual environment (VE) dedicated to RSE the course. It is assumed that you already installed Miniconda (or Anaconda) on your computer. The creation of the VE is performed in command lines, using a terminal (Linux, Mac) or a Conda command prompt (Windows)

1. Create a virtual environment named 'rse'

Copy these command-lines in your conda terminal, one after the other:

- `conda create -n rse -c conda-forge python=3.10 -y`
- `conda activate rse`
- `conda config --add channels conda-forge`

2. Install the required Python packages

Type the following command to install the different packages:

- `conda install spyder opencv gdal rasterio pandas geopandas matplotlib earthpy georasters earthengine-api geemap jupyterlab glob2 joblib -y`

Here is the list of packages to be installed:

- spyder
- opencv
- gdal
- rasterio
- pandas
- geopandas
- matplotlib
- earthpy

- georasters (not georaster)
- earthengine-api
- geemap
- jupyterlab
- glob2
- joblib

3. Make your rse environment available in Jupyter

Type the following command in the conda terminal:

- `python -m ipykernel install --user --name=rse`

FYI: Additional useful command lines

Check the environments available in Jupyter

- `jupyter kernelspec list`

Remove a virtual environment from Jupyter

- `jupyter kernelspec uninstall 'myenv'`
(*'myenv' must be replaced by the actual name of the environment*)

List the existing conda virtual environments

- `conda env list`

Delete a conda virtual environment

- `conda remove -n 'myenv' --all`
(*'myenv' must be replaced by the actual name of the environment*)
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