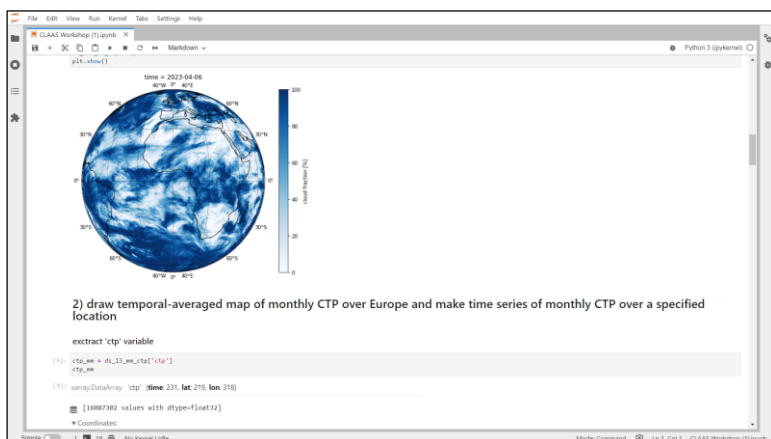


CLAAS – A Climate Data Record of Cloud Properties

HANDS-ON SESSION : From Data download to Data Visualization/Analysis

Option #1: Local machine

- Download the CLAAS Hands-on Jupyter Notebook and the .YAML file or the list of required libraries from this [LINK](#)
- Upload the notebook on the Jupyter instance of your local machine
- Run the notebook step by step and complete the tasks in the Hands-on Section

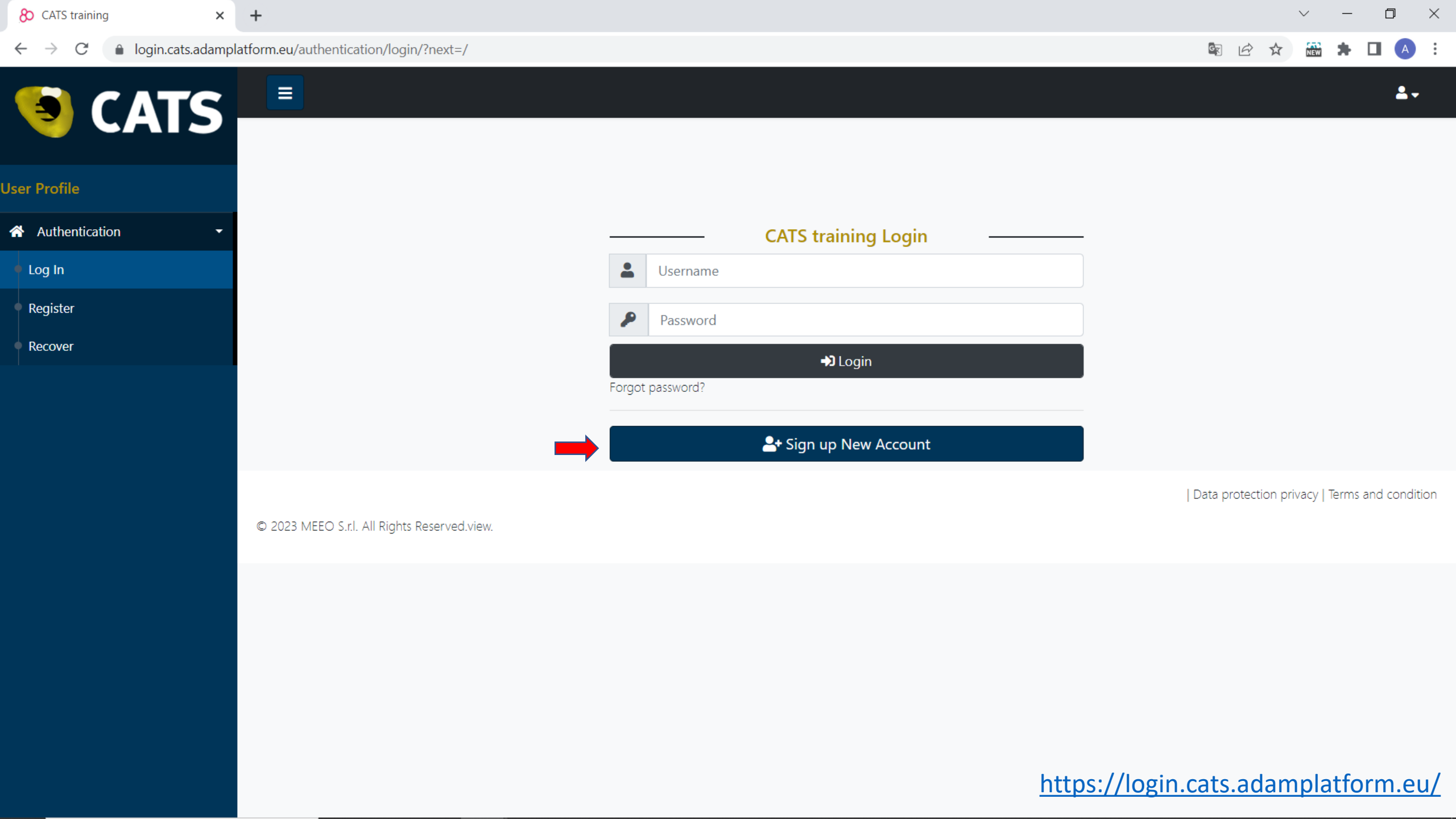


Option #2: Remote Server

- Sign up your own account for the online Jupyter environment at <https://login.cats.adamplatform.eu>
- Authenticate your registration in the received email.
- Go to this [LINK](#), type your credential, then enter the platform: you can now open the notebook and follow the instructions.

The screenshot shows the CATS training Login page. The page has a dark blue header with the CATS logo. The main content area is white and contains a login form. The form has fields for 'Username' and 'Password', a 'Login' button, and a 'Sign up New Account' button. There is also a 'Forgot password?' link. The page is titled 'CATS training Login'.

../		
CLAAS_Short Course 19042023 final.ipynb	19-Apr-2023 11:34	4156791
cfc_2023-04-06-2023-04-06.nc	14-Apr-2023 14:47	6600503
claas_sc_jupyter_env.yaml	18-Apr-2023 16:12	8743
claas_short_course_python_packages.txt	18-Apr-2023 16:16	197
cph_mmdc_2004-01-01-2023-03-01.nc	14-Apr-2023 14:47	224103296
ctp_2004-01-01-2023-03-01.nc	14-Apr-2023 14:47	32620882



User Profile


Authentication

Log In


Register

Recover

CATS training Login

 Username

 Password

 Login

[Forgot password?](#)



 Sign up New Account

The screenshot shows a Jupyter Notebook interface. On the left is a file explorer sidebar with a search bar and a list of files. The main area displays a notebook cell with a title and introductory text. The bottom status bar shows the current mode and file name.

File Explorer Sidebar:

- Filter files by name
- / notebooks /
- Table with 2 columns: Name, Last Modified
- ORD49357 (4 hours ago)
- CLAAS_Sho... (2 hours ago)

Notebook Cell Content:

CLAAS - A Climate Data Record of Cloud Properties

19 April 2023 - Online Short Course

Using the data – Jupyter Notebooks

Introduction

This notebook

- demonstrates how to load CLAAS-3 data into a jupyter notebook;
- shows how to handle CLAAS-3 products and extract parameters from the data.
- provides examples for plotting and analysing CLAAS-3 products.

Link to this notebook, used files and list of python packages:

https://public.cmsaf.dwd.de/data/isolodov/CLAAS3_workshop

Importing required libraries

```
[1]: import os #launching Terminal instruction in the notebook
import tarfile #unpacking .tar files
import xarray as xr # reading NetCDF files
import numpy as np # computations
import pandas as pd # computations
from scipy import stats # statistics
import matplotlib.pyplot as plt # plotting
import cartopy.crs as ccrs # georeferencing
```

Status Bar: Simple 0 Python 3 (ipykernel) | Idle Mode: Command Ln 1, Col 1 CLAAS_Short_Course_19042023.ipynb