

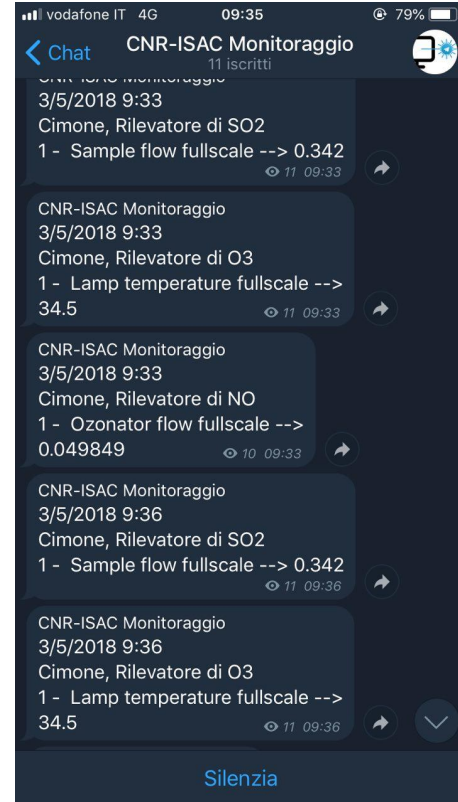


AlertInstruments

A collaboration between E. Fermi and CNR-ISAC

Main Goal

The purpose of this project was to be able to interrogate some tools into the laboratory situated on the Monte Cimone and to check that these detected data were between specific ranges. If not, an alert would be sent to inform the person that has to fix the problem.



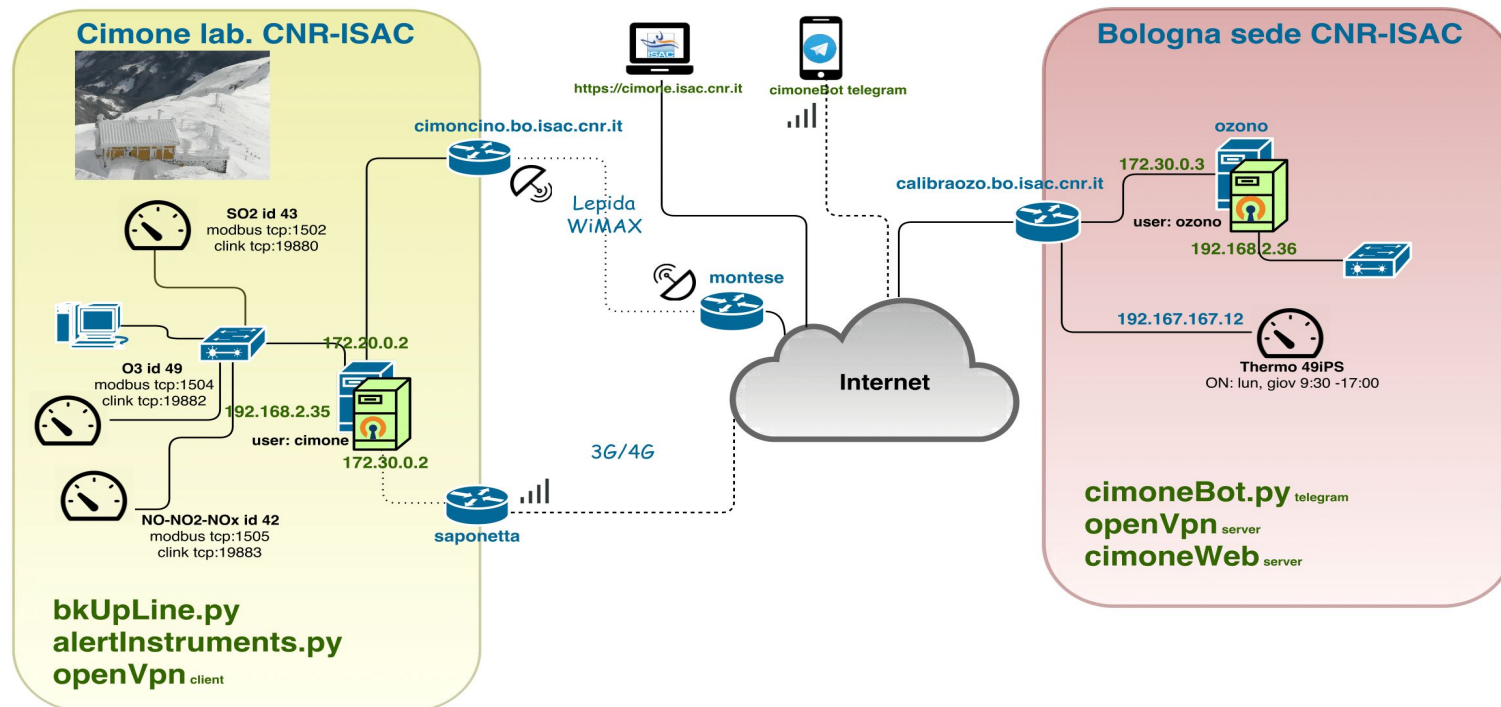
Composition of the project

- a python script to interact with the tools
- a json file used as a database containing the ranges
- a log file for any alerts
- a Telegram bot to send alerts to interested users
- website Monitoraggio

External materials

CNR researchers provided us some useful materials including:

- a text file containing the ranges
- a documentation with all the necessary information about every tool
- a python script with pre-set classes for each tool
- a Linux virtual machine that simulates the server placed into the laboratory on the Cimone



Differenze tra MODBUS e C-Link

MODBUS:

- Livello 7 ISO-OSI (Application)
- Richiesta/risposta PDU
- Più istruttivo

C-Link:

- Livello 4 ISO-OSI (Transport)
- Utilizzo tecnologia socket
- Più semplice ed intuitivo

Bot Telegram



CNR-ISAC Monitoraggio

3/5/2018 10:3

Cimone, Rilevatore di SO₂

1 - Sample flow fullscale --> 0.342

👁 13 10:04:06



CNR-ISAC Monitoraggio

3/5/2018 10:3

Cimone, Rilevatore di O₃

1 - Lamp temperature fullscale --> 34.5

👁 15 10:04:06