

PERSONAL INFORMATION

Alice Portal

📍 Via Monte Cimone 6, 42123 Reggio Emilia, Italy

☎ +39 3481608833

✉ a.portal@campus.unimib.it

Gender Female | Date of birth 15 August 1994 | Nationality(-ies) Italian, British

RESEARCH

February 2023 - now

Post-doc

Universität Bern

Project: compound weather events associated with Mediterranean Cyclones - climatology and large-scale climate drivers (COMPOUND-MED)

Supervisors: Prof Olivia Romppainen-Martius (Universität Bern), Prof Jennifer Catto (University of Exeter), Prof Shira Raveh-Rubin (Weizmann Institute of Science)

November 2019 - January 2023

Ph.D. student

Università Milano–Bicocca,

Laboratoire de Météorologie Dynamique, École Normale Supérieure, Paris

Topic: mid-latitude atmospheric dynamics and climate

Supervisors: Prof Claudia Pasquero, Dr Fabio D'Andrea

Expected PhD defense: April/May 2023

November 2018 - July 2019

M.Sc. Thesis

Centro Euro-Mediterraneo sui Cambiamenti Climatici (CMCC, Bologna)

Topic: seasonal predictability of the boreal winter stratosphere

Supervisors: Dr Paolo Ruggieri, Dr Silvio Gualdi

EDUCATION

December 2016 – July 2019

M.Sc. in Physics (110/110 cum Laude)

Università degli studi di Modena e Reggio Emilia

-Curriculum in Theoretical and Computational Physics

-Title of the Thesis: *The propagation of tropospheric signal to the stratosphere in state-of-the-art seasonal models*

September 2013 – December 2016

B.Sc. in Physics (110/110)

Università degli studi di Modena e Reggio Emilia

-Title of the Thesis: *On the effects of El Niño on the climate of the Euro-Mediterranean basin, how these are affected by the long term Pacific Ocean variability*

2007 – 2013

High School (100/100)

Liceo Classico-Scientifico "Ariosto-Spallanzani", Reggio Emilia

AWARDS

- September 2022 **Young Scientist Conference Awards 2022 (EMS2022)**
Awarded to support participation of outstanding students and young scientists at EMS-co-sponsored conferences.
- September 2021 **Innovative Presentation Award 2021 (EMS2021)**
Competition for the most innovative pre-recorded virtual presentation in terms of its communicative power and scientific quality
- December 2019 **Early Career Scientist's Travel Support (EGU2020)**
Support scheme granted by European Geosciences Union (EGU) for General Assembly 2020 in Vienna
- 2016/17, 2013/14 **"Top Student" award**
Granted by Università degli studi di Modena e Reggio Emilia

SCIENTIFIC SCHOOLS

- June 27 - July 8 2022 **Summer School on Fluid Dynamics of Sustainability and the Environment**
École Polytechnique, Paris
- 25-27 October 2016 **Python for Computational Science**
CINECA, Roma
- 17-20 October 2016 **Introduction to Fortran for Scientific Computing**
CINECA, Bologna
- 9-11 May 2016 **Introduction to Scientific and Technical Computing in C**
CINECA, Bologna

TEACHING EXPERIENCE

- 2022 **"Introduction à la programmation Python" for B.Sc. in Biology (24 h)**
Département Biologie, Université de Versailles Saint-Quentin-en-Yvelines, France
- 2018/19 **"Physics exercises" for B.Sc. in Natural Sciences (35 h)**
Department of Natural Sciences, Università degli studi di Modena e Reggio Emilia, Italy

ARTICLES IN SCIENTIFIC JOURNALS

- January 2023 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda: *Atmospheric response to winter-time Tibetan Plateau cold bias in climate models*, EGU sphere [preprint], 2023. Article under review in Weather and Climate Dynamics. <https://doi.org/10.5194/egusphere-2022-1499>
- September 2022 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda, G. Rivière: *Influence of reduced winter land-sea contrast on the mid-latitude atmospheric circulation*. Article in Journal of Climate (2022). <https://doi.org/10.1175/JCLI-D-21-0941.1>
- May 2021 A. Portal, P. Ruggieri, F. Palmeiro, J. Garcia-Serrano, D. Domeisen, S. Gualdi: *Seasonal prediction of the boreal winter stratosphere*. Article in Climate Dynamics (2021). <https://doi.org/10.1007/s00382-021-05787-9>

- September 2022 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda, G. Rivière: *How is the extratropical circulation affected by reduced Atlantic and Pacific land-sea thermal contrast?*. Oral at "EMS Annual Meeting 2022", Bonn, Germany.
- June 2022 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda, G. Rivière: *The Northern-Hemisphere jets and storm tracks in a reduced land-sea-thermal-contrast climate*. Oral at "Stormtrack workshop 2022", Ile d'Oléron, France.
- May 2022 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda, G. Rivière: *The effects of reduced Atlantic and Pacific land-sea thermal contrast on the extratropical circulation*. Oral at "EGU General Assembly 2022".
- December 2021 A. Portal: *Extratropical circulation: can it be influenced by a reducing land-sea thermal contrast?* Seminar at CMCC premises, Bologna.
- A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda, G. Rivière: *The Impact of Pacific and Atlantic Land-Sea Thermal Contrast on the Mid-Latitude Atmosphere*. iPoster at "AGU Fall Meeting 2021".
- September 2021 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda: *An idealised study of the tropospheric and stratospheric response to reduced winter land sea contrast*. Oral presentation at "9th SISC Annual Conference".
- A. Portal, P. Ruggieri, F. Palmeiro, J. Garcia-Serrano, D. Domeisen, S. Gualdi: *Predictions of the boreal winter stratosphere with the C3S multi-model seasonal forecast system*. Lightning talk at "EMS Annual Meeting 2021".
- April 2021 A. Portal, C. Pasquero, F. D'Andrea, P. Davini, M. Hamouda: *Reduced winter land sea contrast and its effects on mid-latitude atmospheric variability*. vPICO presentation at "EGU General Assembly 2021".
- January 2021 A. Portal: *Relating the extratropical stratosphere and its predictability to ENSO*. Talk at workshop "Pending Issues of the ENSO teleconnections".
- December 2020 A. Portal, P. Ruggieri, F. Palmeiro, J. Garcia-Serrano, D. Domeisen, S. Gualdi: *Seasonal Prediction of the Boreal Stratospheric Vortex*. iPoster at "AGU Fall Meeting 2020".
- May 2020 A. Portal, P. Ruggieri, F. Palmeiro, J. Garcia-Serrano, D. Domeisen, S. Gualdi: *Seasonal prediction of boreal winter stratosphere*. Presentation at "EGU General Assembly 2020".
- December 2019 Contribution to 2nd report of WP1 in project "Blue-Action: Arctic Impact on Weather and Climate".
- November 2019 A. Portal: *Seasonal predictions of winter stratosphere: sources of predictability and underlying dynamics*. Seminar at CMCC premises, Bologna.
- October 2019 A. Portal, P. Ruggieri, F. Palmeiro, J. Garcia-Serrano, D. Domeisen, S. Gualdi: *Seasonal forecast in the winter stratosphere*. Poster at "SISC Annual Conference", Trento.
- P. Ruggieri, A. Portal, F. Palmeiro, J. Garcia-Serrano, D. Domeisen, S. Gualdi: *Seasonal forecast in the winter stratosphere: a view from the C3S multi-model ensemble*. Oral at "Dyn-VarMIP workshop on Atmospheric circulation in a changing climate", Madrid.
- September 2019 P. Ruggieri, F. Palmeiro, A. Portal, J. Garcia-Serrano, S. Gualdi: *Seasonal forecast skill in the winter stratosphere*. Poster at "European Meteorological Society Annual Meeting", Copenhagen.

- June 2019 A. Portal: *La propagazione del segnale troposferico in stratosfera nel sistema di previsione stagionale CMCC (The propagation of tropospheric signal to the stratosphere in the CMCC seasonal prediction system)*. Poster at “Prima Conferenza Nazionale sulle Previsioni Meteorologiche e Climatiche”, Bologna.
- May 2019 A. Portal: *Propagation of tropospheric signal to the stratosphere in the CMCC-SPS3 model*. Seminar at CMCC premises, Bologna.

PERSONAL SKILLS

Languages Italian (mother tongue), English (full proficiency), French (B2), German (Goethe-Zertifikat B1).

Computational skills

- operating systems: Linux, Windows
- programming languages: Python, Fortran, Matlab, Bash
- markup languages: LaTeX