



Curriculum vitae Standardized form

Cesar Azorin-Molina

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Date: 15 April, 2025

Signature

SUMMARY

Cesar Azorin-Molina is a Tenured Scientist -*Científico Titular*- since 2021 at the Spanish National Research Council (<https://www.csic.es/en/csic>; Desertification Research Centre -CIDE-, CSIC-UV-GVA, Valencia, Spain), where he is the **PI of the Climatoc-Lab** (<https://climatoclab.csic.es/>); an **Excellence Research Group** funded by the Valencian Regional Government (PROMETEO grant Ref. CIPROM202338; 2024-2028). Azorin-Molina has an outstanding track record and wide scientific background (22-years of experience, 2003-2025; and **18-years since his PhD**) in the fields of **Meteorology and Atmospheric Sciences**. His scientific aim is to assess and attribute climate change and variability with focus on **surface winds and wind extremes**, their physical mechanisms and implications on a wide socioeconomic (e.g., wind energy) and environmental (e.g., evapotranspiration-drought) issues. He has pioneered the advances in the knowledge of wind changes worldwide, publishing **>150 peer-reviewed articles**, 60 chapter of books and proceedings, and 9 reports, with a **h-index of 53** and **>12,500 citations**; and contributed with >200 oral/poster presentations in national/international conferences (25 invited talks). Since 2016, he coordinates the State of the Climate – Surface winds section of the “Bulletin of the American Meteorological Society”; and actively participated in the ISTI-POST (comparison of wind sensors) of the World Meteorological Organization, the Copernicus (C3S) Data Rescue Service, and the CORDEX-WCRP project. **He coordinated as PI an EC H2020 MSCA-IF, and 15 research projects** funded by the Swedish Research Council, the Spanish Ministry of Science and Innovation, the Swedish Research Council FORMAS, the Spanish CSIC, the GVA, the FBVAA and the NextGenerationEU; **with a total funding of ~8.6 M €**. In addition, he has actively participated in the research team of 15 european, 25 national and 3 regional projects. His supervision tasks cover **4 PhD thesis defended** (2 Sweden, 1 China and 1 in Spain), and **5 ongoing PhD thesis** at the Climatoc-Lab; along with the supervision of 8 Master thesis, 6 postdoc and 2 contracts. He is **associated Editor** of the *Adv. Clim. Chang. Res.*, and reviewer for the Spanish ANEP and DEVA, Swiss National Science Foundation, the United Arab Emirates University, the Poland National Science Centre, and the OSPA EGU / AGU; among other research agencies. Since 2017, **he is principal convener at the EGU**, and also acted as convener at CLIVAR and co-organized 2 scientific meetings. He is also an active external member of the Regional Climate Group-University of Gothenburg (Sweden), and the CSIC PTI+ Climate where he leads the development of a **wind monitor based on AI**. His Climatoc-Lab recently **defined the “Standardized Wind Speed Index”**, a multiscalar indicator to evaluate wind speed conditions with direct transfer to the wind industry (e.g., assessment of wind droughts). Owing his scientific records, he has been awarded with **5 prizes** (e.g., the BBVA Leonardo award in Earth Sciences); granted with **6 highly competitive fellowships** (FPU, Torres Quevedo, JAE-Doc, JdC, MSCA IF, and ranked 1st for “Ramon y Cajal” grant); scientist in 6 centres in Spain and 4 institutions in **Sweden, USA, the Netherlands and Australia (>4-years abroad)**. Finally, he has experience in **teaching** at the University (aprox. 12 ECTS), solid skills on environmental instrumentation, and the development of field experimental campaigns and weather station networks. He has been actively disseminated his wind research through TV, radio and newspapers, including dissemination tasks [@AzorinCesar](#) and [@ClimatocLab](#)

CV in numbers:

Doctoral thesis supervised: 4 defended (2 Sweden, 1 China and 1 Spain) + 5 in progress

Master thesis supervised: 8 defended (2 in Sweden)

Publications in SCI journals: >150 (including *Nature*, *Nat. Clim. Chang.*, *PNAS*, etc.)

Total citations: Web of Science 8,415, Scopus 9,325, Google Scholar 12,589

H-index: Web of Science 44, Scopus 46, Google Scholar 53 i10-index 127

Books as editor and scientific monographs: 9

Chapters in publications in journals not included in JCR, SCI and SSCI: 60

Scientific conferences: >200 + EGU & CLIVAR convener

Participation in research projects: 43 (15 European + 25 National + 3 Regional)

PI and Co-PI in research projects: 15 with 8.6 M€ 1 EC MSCA (€ 186K), 1 Swedish Research Council (€ 356K), 1 Swedish FORMAS (€ 278K), 2 Spanish Ministry (€ 108K + 438K), 3 CSIC (€ 73K), 1 FBBVA (€ 40K), 2 Next Generation EU (€ 6.250K + 175K), 2 GVA (€ 690K)

Contracts with private companies and / or public administrations: 6

1. PERSONAL DATA

Family name: Azorin-Molina **Forename:** Cesar

Gender: M

Nationality: Spaniard

2. ACADEMIC BACKGROUND

[1] **Bachelor of Geography.** University of Alicante. *June 2002.*

[2] **DEA degree (*Master) in Climatology.** University of Alicante. *June 2004.*

[3] **Master in Applied Climatology.** University of Barcelona. *June 2005.*

[4] **European PhD degree in Geography – Climatology.** University of Alicante. *January 31st, 2008.*

3. PRESENT PROFESSIONAL POSITION

Institution: Spanish National Research Council (CSIC)

Faculty, School or Institute: Centro de Investigaciones sobre Desertificación (CIDE)

Department: Ecology and Global Change

<http://www.uv.es/cide/>

Laboratory: Climate, Atmosphere and Ocean Lab (Climatoc-Lab).

<https://climatoclab.csic.es/>

Address: Ctra. CV-315, km 10,7, 46113 Moncada (Valencia)

Country: SPAIN

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Field of study (UNESCO codes):

2209.90; 2501.03; 2501.06; 2502.01; 2502.06; 2502.07; 2505.07; 2509.02; 2509.07; 2509.10;
2509.11; 2509.16; 2509.17; 2509.19; 3311.99

Professional status: *Científico Titular* and Head of the Climatoc-Lab

Duration: Tenured researcher (*Científico Titular*) at CSIC since 16-November-2021

Sexenios (six-year research period): 2 periods, 2010-2015 and 2016-2021

4. RESEARCH INTEREST

- WIND SPEED
- WIND EXTREMES
- CLIMATE CHANGE
- CLIMATE VARIABILITY
- ATMOSPHERIC CIRCULATION
- CLIMATE DATA AND HOMOGENIZATION
- CLIMATE SERVICES

5. PAST SCIENTIFIC EXPERIENCE

[1] **Collaboration scholarship.** University Institute of Geography. Laboratory of Climatology. University of Alicante. *October 2001 – December 2002.*

[2] **FPU Pre-doctoral researcher.** University Institute of Geography. Laboratory of Climatology. University of Alicante. *January 2003 – May 2006.*

[3] **FPU Pre-doctoral visitor.** Laboratory of Climatology. Group of Climatology. University of Barcelona. *November 2003 – March 2004.*

[4] **FPU Pre-doctoral visitor.** Laboratory of Climatology. Group of Climatology. University of Barcelona. *August 2004 – May 2005.*

[5] **FPU Pre-doctoral visitor.** Earth Science Centre. Regional Climate Group. University of Göteborg (Sweden). *August 2005 – December 2005.*

[6] **Pre-doctoral researcher.** University Institute of Geography. Laboratory of Climatology. University of Alicante. *June 2006 – December 2006.*

[7] **FPU Pre-doctoral visitor.** Cooperative Institute for Research in the Atmosphere. Colorado State University (USA). *June 2006 – September 2006.*

[8] **Postdoctoral researcher.** Atmospheric Research Program. The CEAM Foundation (Valencia). *February 2008 – December 2008.*

[9] **Torres Quevedo postdoctoral researcher.** Atmospheric Research Program. The CEAM Foundation (Valencia). *January 2009 – May 2009.*

[10] **Torres Quevedo postdoctoral researcher.** Meteorology and Climatology Program. The CEAM Foundation (Valencia). *June 2009 – December 2010.*

[11] **Postdoctoral visitor.** Weather Research Department. The Royal Netherlands Meteorological Institute (KNMI. The Netherlands). *August 2010 – December 2010.*

[12] **JAE-Doc postdoctoral researcher.** Pyrenean Institute of Ecology. Spanish Research Council (CSIC). *December 2010 – December 2012.*

[13] **Juan de la Cierva postdoctoral researcher.** Pyrenean Institute of Ecology. Spanish Research Council (CSIC). *December 2012 – Until December 2015.*

[14] Postdoctoral visitor. Commonwealth Scientific and Industrial Research Organisation (CSIRO, Australia). *March 2015 – May 2015.*

[15] Postdoctoral researcher. Pyrenean Institute of Ecology. Spanish Research Council (CSIC). *January 2016 – Until August 2016.*

[16] Marie Skłodowska-Curie Individual Fellowship. Earth Science Centre. Regional Climate Group. University of Göteborg (Sweden). *September 2016 – August 2018.*

[17] Postdoctoral visitor - Marie Skłodowska-Curie Individual Fellowship. R&D Observations and Data Technology Department. The Royal Netherlands Meteorological Institute (KNMI. The Netherlands). *November 2016 – February 2017.*

[18] Assistant Professor (*Forskarassistent*). Earth Science Centre. Regional Climate Group. University of Göteborg (Sweden). *September 2018 – August 2019 (resigned in August 2019 to start the Ramon y Cajal position at CSIC).*

[19] Ramon y Cajal fellowship. Desertification Research Centre. Spanish National Research Council (CIDE, CSIC-UV-GVA). *September 2019-November 2021.*

[20] Científico Titular - tenure-track. Desertification Research Centre. Spanish National Research Council (CIDE, CSIC-UV-GVA). *Since 16 November 2021.*

6. ACADEMIC PRIZES

[1] Beca Leonardo a Investigadores y Creadores Culturales - Award in Earth Sciences. BBVA Foundation. Bilbao, Spain, *June 2021.*

[2] Award for outstanding contribution in reviewing. Editors of Atmospheric Research. Elsevier, Amsterdam, The Netherlands, *May 2015.*

[3] Extraordinary Doctoral Prize to the best Ph.D. Student in Geography. University of Alicante. Alicante, *January 2011.*

[4] First prize - scientific photography. Spanish Climatological Society. Santander, *November 2004.*

[5] National Award Prize to the best national student's record of the Geography's Degree. National Final-Year Prize 2001/2002. Spain's Education and Science Ministry. Madrid, *June 2003.*

7. LANGUAGES

<i>Language</i>	<i>Speaking</i>	<i>Reading</i>	<i>Writing</i>
SPANISH	P	P	P
ENGLISH	G	P	P
VALENCIAN/CATALAN	G	P	P

(N = NORMAL, G = GOOD, P = PERFECTLY).

8. PUBLICATIONS

8.1. PEER-REVIEW PAPERS [available in the ISI Web of Science, Scopus, etc.]

- [152] VICENTE-SERRANO, S.M., DOMINGUEZ-CASTRO, F., BEGUERIA, S., EL KENAWY, A., GIMENO-SOTELO, L., FRANQUESA, M., **AZORIN-MOLINA, C.**, ANDRES-MARTIN, M., HALIFA-MARÍN, A., 2025: Atmospheric Drought Indices in future projections. *Nature Water*. doi: 10.1038/s44221-025-00416-9
- [151] VICENTE-SERRANO, S.M., TRAMBLAY, Y., REIG, F., GONZÁLEZ-HIDALGO, J.C., BEGUERÍA, S., BRUNETTI, M., CINDRIĆ KALIN, K., PATALEN, L., KRŽIČ, A., LIONELLO, P., LIMA, M.M., TRIGO, R.M., EL-KENAWY, A.M., EDDENJAL, A., TÜRKES, M., KOUTROULIS, A., MANARA, V., MAUGERI, M., BADI, W., MATHBOUT, S., BERTALANIĆ, R., BOCHEVA, L., DABANLI, I., DUMITRESCU, A., DUBUISSON, B., SAHABI-ABED, S., ABDULLA, F., FAYAD, A., HODZIC, S., IVANOV, M., RADEVSKI, I., PEÑA-ANGULO, D., LORENZO-LACRUZ, J., DOMÍNGUEZ-CASTRO, F., GIMENO-SOTELO, L., GARCÍA-HERRERA, R., FRANQUESA, M., HALIFA-MARÍN, A., ADELL-MICHAVILA, M., NOGUERA, I., BARRIOPEDRO, D., GARRIDO-PEREZ, J.M., **AZORIN-MOLINA, C.**, ANDRES-MARTIN, M., GIMENO, L., NIETO, R., CARMEN LLASAT, M., MARKONIS, Y., SELMI, R., RACHED, S.B., RADOVANOVIĆ, S., SOUBEYROUX, J.-M., RIBES, A., ELMEHDI SAIDI, M., BATAINEH, S., EL KHALKI, ROBAA, S., BOUCETTA, A., ALSAFADI, K., MAMASSIS, N., MOHAMMED, S., FERNÁNDEZ-DUQUE, B., CHEVAL, S., MOUTIA, S., STEVKOV, A., STEVKOVA, S., YOLANDA LUNA, M., POTOPOVÁ, V. 2025: High temporal variability not trend dominates Mediterranean precipitation. *Nature* 639, 658-666. doi: 10.1038/s41586-024-08576-6
- [150] MA, Y., SHI, P., **AZORIN-MOLINA, C.**, MINOLA, L., GUIJARRO, J.A., MA, H., WANG, Y., ZHANG, G. 2024: Decline in daily maximum wind speed over the Tibetan Plateau during 1973-2020: an examination of likely causes. *Climate Dynamics*. doi: 10.1007/s00382-024-07436-3
- [149] **AZORIN-MOLINA, C.**, DUNN, R.J.H., RICCIARDULLI, L., MEARS, C.A., NICOLAS, J.P., McVICAR, T.R., ZENG, Z., BOSILOVICH, M.G. 2024: Land and ocean surface winds [in "State of the Climate in 2023"]. *Bulletin of American Meteorological Society* 105(8), S76-S79. doi: 10.1175/BAMS-D-24-0116.1
- [148] UTRABO-CARAZO, E., LOCKWOOD, J.F., DUNN, R.J.H., MINOLA, L., AGUILAR, E., **AZORIN-MOLINA, C.**, 2024: Effects of extreme stratospheric polar vortex events on near-surface wind gusts across Europe. *Environmental Research Letters* 19(9), 094044. doi: 10.1088/1748-9326/ad67f4
- [147] ZHA, J., CHUAN, T., QIU, Y., ZHAO, D., FAN, W., ZHAO, T., ANDRES-MARTIN, M., **AZORIN-MOLINA, C.**, CHEN, D., 2024: Projected near-surface wind speed changes over Central Asia using dynamical downscaling with bias-corrected global climate models. *Advances in Climate Change Research*. doi: 10.1016/j.accres.2024.07.007
- [146] ANDRES-MARTIN, M., **AZORIN-MOLINA, C.**, SERRANO, E., GONZALEZ, S., GUIJARRO, J.A., BEDOYA-VALETT, S., UTRABO-CARAZO, E., VICENTE-SERRANO, S.M. 2024: Near-surface wind speed trends and variability over the Antarctic Peninsula, 1979–2022. *Atmospheric Research*. doi: 10.1016/j.atmosres.2024.107568

- [145] VERDU, M., BOCHET, E., ESPIGARES, T., MARGALEF-MARRASE, J., NICOLAU, J.M., YU, Y., **AZORIN-MOLINA, C.**, GARCÍA-FAYOS, P., 2024. Climate change may alter the signal of plant facilitation in Mediterranean drylands. *Oikos* 2024(8), e10217. doi: 10.1111/oik.10217
- [144] ZHANG, G., **AZORIN-MOLINA, C.**, CHEN, D., McVICAR, T.R., GUIJARRO, J.A., DENG, K., MINOLA, L., LEE, J., SON, S-W., MA, H., SHI, P. 2024: Variability and trends of near-surface wind speed over the Tibetan Plateau: the role played by the westerly and Asian Monsoon. *Advances in Climate Change Research* 15(3), 525-536. doi: 10.1016/j.accre.2024.04.007
- [143] LIU, Y., ZHOU, L., QIN, Y., **AZORIN-MOLINA, C.** SHEN, C., XU, R., ZENG, Z., 2024: Impacts of anemometer changes, site relocations and processing methods on wind speed trends in China. *Atmospheric Measurement Techniques* 17, 1123-1131. doi: 10.5194/amt-17-1123-2024
- [142] MINOLA, L., ZHANG, G., OU, T., KUKULIES, J., CURIO, J., GUIJARRO, J.A., DENG, K., **AZORIN-MOLINA, C.**, SHEN, C., PEZZOLI, A., CHEN, D., 2024: Climatology of near-surface wind speed from observations and high-resolution climate models over the Tibetan Plateau. *Climate Dynamics* 62, 933-953. doi: 10.1007/s00382-023-06931-3
- [141] PASHAIE, Z., SARI SARRAF, B., **AZORIN-MOLINA, C.**, MOHAMMADI, G.H., GUIJARRO, J.A., 2023: A marked interannual variability of haze linked to particulate sources and meteorological conditions in Tehran (Iran), 1990-2020. *Urban Climate* 52, doi: 10.1016/j.uclim.2023.101682
- [140] ZHAO, Y., LIANG, S., LIU, Y., McVICAR, T.R., **AZORIN-MOLINA, C.**, ZHOU, L., DUNN, R.J.H., JEREZ, S., QING, Y., YANG, X., XU, J., ZHENZHONG, Z. 2023: Global assessment of spatiotemporal changes of frequency of terrestrial wind speed. *Environmental Research Letters*. 18(4), 044048. doi: 10.1088/1748-9326/acc9d5
- [139] FERNANDEZ-DUQUE, B., VICENTE-SERRANO, S.M., MAYNARD, O., DOMINGUEZ-CASTRO, F., PEÑA-ANGULO, D., NOGUERA, I., **AZORIN-MOLINA, C.**, EL KENAWY, A. 2023. Long-term changes of temperature, relative humidity and vapour pressure deficit in Bolivia (1950-2019). *International Journal of Climatology* 43(14): 6484-6504. doi: 10.1002/joc.8226
- [138] ANDRES-MARTIN, M., **AZORIN-MOLINA, C.**, SHEN, C., FERNÁNDEZ-ÁLVAREZ, J.C., GIMENO, L., VICENTE-SERRANO, S.M., ZHA, J. 2023. Uncertainty in wind speed projections over the Iberian Peninsula: CMIP6 GCMs vs. a WRF-RCM. In "The Year in Climate Science Research". *Annals of the New York Academy of Sciences*. 1-8. doi: 10.1111/nyas.15063
- [137] MINOLA, L., LÖNN, J., **AZORIN-MOLINA, C.**, ZHOU, C., ENGSTRÖM, E., WERN, L., HELLSTRÖM, S., ZHANG, G., SHEN, C., PEZZOLI, A., CHEN, D. 2023. The contribution of large-scale atmospheric circulation to variations of observed near-surface wind speed across Sweden since 1926. *Climatic Change*. 176(5): 54. doi: 10.1007/s10584-023-03525-0
- [136] **AZORIN-MOLINA, C.**, DUNN, R.J.H., RICCIARDULLI, L., MEARS, C.A., McVICAR, T.R., NICOLAS, J.P., ZENG, Z., BOSILOVICH, M.G. 2023: [Global climate; Atmospheric circulation] Land and ocean surface winds [in "State of the Climate in 2022"]. *Bulletin of American Meteorological Society*. 104(9), S72-S74. doi: 10.1175/2023BAMSStateoftheClimate.1

- [135] HUANG, X., DUNN, R.J.H., LI, L.Z.X., McVICAR, T.R., **AZORIN-MOLINA, C.**, ZENG, Z. 2023. Increasing global terrestrial diurnal temperature range for 1980-2021. *Geophysical Research Letters*. 50(11), e2023GL103503, doi: 10.1029/2023GL103503
- [134] ENGSTRÖM, E., WERN, L., HELLSTRÖM, S., KJELLSTROM, E., ZHOU, C., CHEN, D., **AZORIN-MOLINA, C.**, 2023: Data rescue of historical wind observations in Sweden since the 1920s. *Earth System Science Data* 15(6), 2259-2277. doi: 10.5194/essd-15-2259-2023
- [133] **AZORIN-MOLINA, C.**, SAFAEI PIROOZ, A.A., BEDOYA-VALESTT, S., UTRABO-CARAZO, E., ANDRES-MARTIN, M., SHEN, C., MINOLA, L., GUIJARRO, JOSE A., AGUILAR, E., BRUNET, M., FLAY, R. G.J., VICENTE-SERRANO, S.M., McVICAR, T.R., CHEN, D., 2023: Biases in wind speed due to anemometer changes. *Atmospheric Research* 289, 106771. doi: 10.1016/j.atmosres.2023.106771
- [132] UTRABO-CARAZO, E., **AZORIN-MOLINA, C.**, AGUILAR, E., BRUNET, M., 2023: A Spectral Analysis of Near-Surface Wind Speed and Gusts over the Iberian Peninsula. *Geophysical Research Letters*. 50, e2023GL103323. <https://doi.org/10.1029/2023GL103323>
- [131] NOGUERA, I., VICENTE-SERRANO, S.M., PEÑA-ANGULO, D., DOMINGUEZ-CASTRO, F., JUEZ, C., TOMAS-BURGUERA, M., LORENZO-LACRUZ, J., **AZORIN-MOLINA, C.**, HALIFA-MARIN, A., FERNANDEZ-DUQUE, B., EL KENAWY, A., 2023: Assessment of vapour pressure deficit variability and trends in Spain and possible connections with soil moisture. *Atmospheric Research* 285. doi: 10.1016/j.atmosres.2023.106666
- [130] BEDOYA-VALESST, S., **AZORIN-MOLINA, C.**, GIMENO, L., GUIJARRO, J.A., SANCHEZ-MORCILLO, V., AGUILAR, E., BRUNET, M. 2023: Opposite trends of sea-breeze speeds and gusts in Eastern Spain, 1961-2019. *Climate Dynamics* 60, 2847-2869. doi: 10.1007/s00382-022-06473-0
- [129] VICENTE-SERRANO, S.M., MAILLARD, O., PEÑA-ANGULO, D., DOMÍNGUEZ-CASTRO, F., NOGUERA, I., LORENZO-LACRUZ, J., **AZORIN-MOLINA, C.**, JUEZ, C., GUIJARRO, J.A., HALIFA-MARÍN, A., EL KENAWY, A., 2023: Evaluation of long-term changes in precipitation over Bolivia based on observations and CMIP models. *International Journal of Climatology*. 43(3), 1431-1447. doi: 10.1002/joc.7924
- [128] FAN, K., HE, M., BAI, M., DONG, Z., LINDERHOLM, H., **AZORIN-MOLINA, C.**, GUO, Z. 2022: The potential to use variations in tree-ring geometric center to estimate past wind speed change. *Natural Hazards Research* 2, 132-137. doi: 10.1016/j.nhres.2022.04.004
- [127] ZHA, J., SHEN, C., WU, J., ZHAO, D.-M., FANG, W.-X., JIANG, H.-P., **AZORIN-MOLINA, C.**, CHEN, D. 2022: Effects of Northern Hemisphere Annular mode on terrestrial near-surface wind speed over Eastern China from 1979 to 2017. *Advances in Climate Change Research*. doi: 10.1016/j.accre.2022.10.005
- [126] LIU, Y., ZENG, Z., XU, R., ZIEGLER, A.D., JEREZ, S., CHEN, D., CHAPPELL, A., **AZORIN-MOLINA, C.**, ZHOU, L., XU, H., LI, L.Z., DONG, L., ZHOU, F., CAO, R., LIU, J., YE, B., KUANG, X., YANG, X. 2022: Increases in China's wind energy production from the recovery of winds since 2012. *Environmental Research Letters*. 17 114035. doi: 10.1088/1748-9326/ac9cf4

- [125] ZHOU, L., LIU, H., JIANG, X., ZIEGLER, A.D., **AZORIN-MOLINA, C.**, LIU, J., ZENG, Z. 2022: An artificial intelligence construction of global gridded surface winds. *Science Bulletin*. 67(20), 2060-2063. doi: 10.1016/j.scib.2022.09.022
- [124] SHEN, C., ZHA, J., LI, Z., **AZORIN-MOLINA, C.**, DENG, K., MINOLA, L., CHEN, D. 2022: Evaluation of global terrestrial near-surface wind speed simulated by CMIP6 models and their future projections. In "The Year in Climate Science Research". *Annals of the New York Academy of Sciences* 1518(1), 249-263. doi: 10.1111/nyas.14910
- [123] **AZORIN-MOLINA, C.**, DUNN, R.J.H., RICCIARDULLI, L., MEARS, C.A., McVICAR, T.R., NICOLAS, J.P. 2022: [Global climate; Atmospheric circulation] Land and ocean surface winds [in "State of the Climate in 2021"]. *Bulletin of American Meteorological Society*. 103(8), S71-S73. doi: 10.1175/2022BAMSStateoftheClimate.1
- [122] DENG, K., LIU, W., **AZORIN-MOLINA, C.**, YANG, S., LI, H., ZHANG, G., MINOLA, L., CHEN, D., 2022: Terrestrial Stilling Projected to Continue in the Northern Hemisphere Mid-latitudes. *Earth's Future* 10(7), e2021EF002448. doi: 10.1029/2021EF002448
- [121] DUNN, R.J.H., **AZORIN-MOLINA, C.**, MENNE, M., ZENG, Z., CASEY, N., SHEN, C. 2022: Reduction in reversal of global stilling arising from correction to encoding of calm periods. *Environmental Research Communications* 4(6) 061003. doi: 10.1088/2515-7620/ac770a
- [120] ZHOU, F., ZHAO, Z., **AZORIN-MOLINA, C.**, JIA, X., ZHANG, G., CHEN, D., LIU, J., GUIJARRO, J.A., ZHANG, F., FANG, K. 2022: Teleconnections between large-scale oceanic-atmospheric patterns and interannual surface wind speed variability across China: regional and seasonal patterns. *Science of the Total Environment*. 838, 156023. doi: 10.1016/j.scitotenv.2022.156023
- [119] ZHENG, C-W., LI, X-H, **AZORIN-MOLINA, C.**, LI, C-Y., WANG, Q., XIAO, Z.N., YANG, S-B., CHEN, X., ZHAN, C. 2022: Global Trends in Oceanic Wind Speed, Wind-sea, Swell and Mixed Wave Heights. *Applied Energy* 321, 119327. doi: 10.1016/j.apenergy.2022.119327
- [118] UTRABO-CARAZO, E., **AZORIN-MOLINA, C.**, SERRANO-NAVARRO, E., AGUILAR, E., BRUNET, M., GUIJARRO, J.A., 2022: Wind stilling ceased in the Iberian Peninsula since the 2000s, 1961-2019. *Atmospheric Research* 272, 106153. doi: 10.1016/j.atmosres.2022.106153
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- [27] VICENTE-SERRANO, S.M., LÓPEZ-MORENO, J.I., BEGUERÍA, S., LORENZO-LACRUZ, J., EL KENAWY, A., **AZORIN-MOLINA, C.**, MORÁN-TEJEDA, E., ZABALZA, J., and ANGULO, M., 2010: The impact of North Atlantic Oscillation on Droughts in the Mediterranean region. *ESF-MedCLIVAR Workshop on "Hydrological, socioeconomic and ecological impacts of the North Atlantic Oscillation in the Mediterranean region"*, Zaragoza, Spain. **Oral presentation**. [Book chapter publication]
- [26] SANCHEZ-LORENZO, A., PALLÉ, E., WILD, M., CALBÓ, J., BRUNETTI, M., STANHILL, G., BRAZDIL, R., BARRIENDOS, M., DESER, C., PEREIRA, P., **AZORIN-MOLINA, C.**, 2010: The SunCloud project: worldwide compilation of long-term series of sunshine duration and cloudiness observations. *EGU General Assembly 2010*, Vienna, Austria. **Poster presentation**. [Abstract publication EGU2010-14316]
- [25] ESTRELA NAVARRO, M.J., VALIENTE PARDO, J.A., CORELL CUSTARDOY, D., and **AZORÍN MOLINA, C.**, 2010: Análisis de la variabilidad espacio y temporal del agua de niebla en una región mediterránea (Comunidad Valenciana). *7th Annual Meeting of the Spanish Climatological Society*, Madrid, Spain. **Poster and oral presentation**. [Proceeding publication]
- [24] MARTÍNEZ IBARRA, E., **AZORÍN MOLINA, C.**, BAÑÓN, M., OLCINA CANTOS, J., ESTRELA NAVARRO, M.J., and GIL OLCINA, A., 2010: Intercomparación de la temperatura del aire en tres tipos de garita meteorológica: Stevenson, Montsouris y Campbell. *7th Annual Meeting of the Spanish Climatological Society*, Madrid, Spain. **Poster presentation**. [Proceeding publication]

- [23] CORELL-CUSTARDOY, D., **AZORIN-MOLINA, C.**, ESTRELA-NAVARRO, M.J., VALIENTE-PARDO, J.A., and SANZ-SÁNCHEZ, F., 2010: Fog water chemistry in the Western Mediterranean basin (Valencia region, Spain). *5th International Conference on Fog, Fog Collection and Dew*, Münster, Germany. **Oral presentation**. [Proceeding publication]
- [22] **AZORIN-MOLINA, C.**, CORELL-CUSTARDOY, D., ESTRELA-NAVARRO, M.J., and VALIENTE-PARDO, J.A., 2010: Fog water collection under sea breeze conditions in the Western Mediterranean basin (Valencia region, Spain). *5th International Conference on Fog, Fog Collection and Dew*, Münster, Germany. **Oral presentation**. [Proceeding publication]
- [21] CORELL-CUSTARDOY, D., VALIENTE-PARDO, J.A., ESTRELA-NAVARRO, M.J., GARCÍA-SÁNCHEZ, F., and **AZORIN-MOLINA, C.**, 2010: Red de colectores de agua de niebla de la Fundación CEAM. *Segones Jornades de Meteorologia i Climatologia de la Mediterrània Occidental*, Valencia, Spain. **Poster presentation**. [Abstract publication]
- [20] CORELL-CUSTARDOY, D., VALIENTE-PARDO, J.A., ESTRELA-NAVARRO, M.J., GARCÍA-SÁNCHEZ, F., and **AZORIN-MOLINA, C.**, 2010: Red de torres meteorológicas de la Fundación CEAM. *Segones Jornades de Meteorologia i Climatologia de la Mediterrània Occidental*, Valencia, Spain. **Poster presentation**. [Abstract publication]
- [19] **AZORIN-MOLINA, C.**, VICENTE-SERRANO, S.M., BAENA-CALATRAVA, R., and CONNELL, B.H., 2009: Validation of a daytime over land algorithm for computing convective cloud composites over the Iberian Peninsula and Balearic Islands (Spain). *2009 EUMETSAT Meteorological Satellite Conference*, Bath, United Kingdom. **Poster presentation**. [Proceeding publication]
- [18] **AZORIN-MOLINA, C.**, ESTRELA, M.J., CONNELL, B., and BAENA-CALATRAVA, R., 2009: AVHRR Infrared brightness temperatures at the cloud tops of sea breeze fronts over the Iberian Mediterranean area and the isle of Mallorca (Spain). *11th Plinius Conference on Mediterranean Storms*, Barcelona, Spain. **Poster presentation**. [Abstract publication]
- [17] PEREIRA, P., **AZORIN-MOLINA, C.**, CASTELL BALAGUER, N., SANCHEZ-LORENZO, A., and LOPEZ-BUSTINS, J.A., 2009: Summer ozone cycles in the Lisbon Metropolitan Area and its relation to some meteorological variables. *12th Conference for Lithuania Junior Researches, SCIENCE FOR FUTURE (Environmental Engineering)*, Vilnius, Lituania. **Poster and oral presentation**. [Proceeding publication]
- [16] ESPINÓS MORATÓ, H., MANTILLA IGLESIAS, E., and **AZORÍN MOLINA, C.**, 2008: Evaluación de un modelo meteorológico de diagnóstico en la generación de campos de viento en entornos locales de topografía compleja. *Primeres Jornades de Meteorologia i Climatologia de la Mediterrània Occidental*, Barcelona, Spain. **Poster presentation**. [Abstract publication]
- [15] **AZORÍN MOLINA, C.**, MANTILLA IGLESIAS, E., and MILLÁN, M., 2008: Estudio de la marea atmosférica en un punto de la costa Mediterránea: Alicante. *Primeres Jornades de Meteorologia i Climatologia de la Mediterrània Occidental*, Barcelona, Spain. **Poster presentation**. [Abstract publication]
- [14] **AZORÍN MOLINA, C.**, CASTELL BALAGUER, N., MANTILLA IGLESIAS, E., SALVADOR POLO, R., and MILLÁN, M., 2008: Brisas marinas y contaminación fotoquímica por ozono en la cuenca del Mediterráneo Occidental: Alicante. *XI Congreso de Ingeniería Ambiental*, Bilbao, Spain. **Oral presentation**. [Proceeding publication]

- [13] **AZORÍN MOLINA, C.**, CASTELL BALAGUER, N., MANTILLA IGLESIAS, E., and MILLÁN, M., 2008: Estudio de la relación entre la persistencia de las brisas marinas y los niveles de concentración de ozono en un punto del litoral de Alicante. *6th Annual Meeting of the Spanish Climatological Society*, Tarragona, Spain. **Poster presentation**. [Proceeding publication]
- [12] LÓPEZ BUSTINS, J.A., SÁNCHEZ LORENZO, A., **AZORÍN MOLINA, C.**, and ORDÓÑEZ LÓPEZ, A., 2008: Evaluación local del cambio climático en la montaña prebética de Alicante. *6th Annual Meeting of the Spanish Climatological Society*, Tarragona, Spain. **Poster and oral presentation**. [Proceeding publication]
- [11] **AZORÍN MOLINA, C.**, and AZORÍN MOLINA, J.C., 2008: Estudio experimental del efecto artificial introducido por la garita meteorológica en la temperatura mínima del aire. *6th Annual Meeting of the Spanish Climatological Society*, Tarragona, Spain. **Poster presentation**. [Proceeding publication]
- [10] **AZORIN-MOLINA, C.**, BALDI, M., and DALU, G., 2008: An analytical study of the inland penetration of sea breezes in presence of complex topography. *EGU General Assembly 2008*, Vienna, Austria. **Oral presentation**. [Abstract publication EGU2008-A-05678]
- [9] **AZORIN-MOLINA, C.**, CONNELL, B.H., and BAENA-CALATRAVA, R., 2007: A new APOLLO daytime over land algorithm for computing convective cloud composites over the Iberian Peninsula and Balearic Islands. *7th Annual Meeting of the European Meteorological Society*, El Escorial (Madrid), Spain. **Poster presentation**. [Abstract publication 00542]
- [8] **AZORIN-MOLINA, C.**, GUIJARRO-PASTOR, J.A., BAENA-CALATRAVA, R., and JANSÀ, A., 2007: Sea breeze convergence and convective cloud frequencies from AVHRR data over the Isle of Mallorca. *7th Annual Meeting of the European Meteorological Society*, El Escorial (Madrid), Spain. **Poster presentation**. [Abstract publication 00541]
- [7] **AZORIN-MOLINA, C.**, and CHEN, D., 2007: Influence of synoptic-scale flows on sea breeze evolution: A study of the dynamics of wind hodographs. *7th Annual Meeting of the European Meteorological Society*, El Escorial (Madrid), Spain. **Poster presentation**. [Abstract publication 00520]
- [6] LÓPEZ BUSTINS, J.A., and **AZORÍN MOLINA, C.**, 2006: WeMOi: criterio objetivo de selección de la brisa marina en el sureste de la Península Ibérica (Alicante). *5th Annual Meeting of the Spanish Climatological Society*, Zaragoza, Spain. **Poster and oral presentation**. [Proceeding publication]
- [5] **AZORIN-MOLINA, C.**, SANCHEZ-LORENZO, A., and CALBÓ, J., 2006: Sea breeze effect on cloudiness in the southeast Iberian Peninsula (Alicante, Spain). *6th Annual Meeting of the European Meteorological Society*, Ljubljana, Slovenia. **Poster presentation**. [Abstract publication 00294]
- [4] SANCHEZ-LORENZO, A., **AZORIN-MOLINA, C.**, MARTIN-VIDE, J., CALBÓ, J., and MORENO, M^a.C., 2006: Weekly variation in the low cloud cover and frequency of cloud-types series in Spanish cities. *6th International Conference on Urban Climate*, Göteborg, Sweden. **Poster presentation**. [Abstract and proceeding publication]
- [3] LOPEZ-BUSTINS, J.A., and **AZORIN-MOLINA, C.**, 2005: The Western Mediterranean Oscillation Index (WeMOi): An objective primary filter for finding sea breeze days on the East coast of the

Iberian Peninsula (Spain). *5th Annual Meeting of the European Meteorological Society*, Utrecht, The Netherlands. **Poster presentation**. [Abstract publication 00188]

- [2] LÓPEZ BUSTINS, J.A., and **AZORÍN MOLINA, C.**, 2004: Aplicación del índice diario de la Oscilación del Mediterráneo Occidental al estudio de la tipología pluviométrica en Alicante. *4th Annual Meeting of the Spanish Climatological Society*, Santander, Spain. **Poster and oral presentation**. [Proceeding publication]
- [1] **AZORÍN MOLINA, C.**, 2004: Estimación de la ocurrencia de la brisa marina en Alicante. *4th Annual Meeting of the Spanish Climatological Society*, Santander, Spain. **Poster and Oral presentation**. [Proceeding publication]

10. MASTER AND DOCTORAL THESIS SUPERVISED

Doctoral thesis

- [8] POGGI, M.: *Variabilidad climática de la velocidad media viento, mecanismos de circulación atmosférica y su predictibilidad en Argentina*. University of Buenos Aires (UAB), Buenos Aires, Argentina. Directed by Dr. María Laura Betolli and **Dr. Cesar Azorin-Molina**. Ongoing.
- [7] ANDRES-MARTIN, M.: *Estudio de la variabilidad de los eventos de “wind drought” y su aplicación a servicios climáticos*. CIDE (CSIC-UV-GVA), Valencia. Directed by **Dr. Cesar Azorin-Molina** and Dr. Sergio M. Vicente-Serrano. FPU scholarship. Since November 2022. Ongoing.
- [6] BEDOYA VALESTT, S.: *Cambios observados y simulados de los vientos locales y brisas marinas*. CIDE (CSIC-UV-GVA), Valencia. Directed by **Dr. Cesar Azorin-Molina** and Dr. Luis Gimeno. Santiago Grisolia scholarship. Since September 2022. Ongoing.
- [5] UTRABO-CARAZO, E.: *Estudio y atribución de la variabilidad multidecadal del viento y sus extremos, con énfasis en la Península Ibérica*. CIDE (CSIC-UV-GVA). Directed by **Dr. Cesar Azorin-Molina** and Dr. Enric Aguilar. FPI scholarship. Since October 2020. Ongoing.
- [4] SHEN, C.: *Evaluation and projection of the changes in near-surface wind speed: implication for wind energy potential*. Earth Sciences Centre, Regional Climate Group, University of Gothenburg, Göteborg, Sweden. Supervised by Dr. Deliang Chen. **Assistant supervisor: Dr. Cesar Azorin-Molina**. Defended 13 September 2024.
- [3] NAVARRO-SERRANO, F.M.: *Análisis del comportamiento altitudinal de la temperatura del aire superficial en áreas de montaña*. Instituto Pirenaico de Ecología, Spanish National Research Council (IPE-CSIC), Zaragoza, Spain. Directed by Dr. Juan-I. Lopez-Moreno and **Dr. Cesar Azorin-Molina**. Defended 18 December 2020.
- [2] MINOLA, L.: *Changes in near-surface winds across Sweden over the past decades – Observations and simulations*. Earth Sciences Centre, Regional Climate Group, University of Gothenburg, Göteborg, Sweden. Directed by **Dr. Cesar Azorin-Molina** and Dr. Deliang Chen. Defended 11 December 2020.
- [1] ZHANG, G.: *Wind speed variability and associated environment issues with a focus on northern China*. Beijing Normal University, Beijing, China. Directed by Dr. Peijun Shi, Dr. Deliang Chen and **Dr. Cesar Azorin-Molina**. Defended 20 May 2020.

Master thesis

- [8] LÖNN, J.: Earth Sciences Centre, Regional Climate Group, University of Gothenburg, Göteborg, Sweden. Master thesis of Science. Directed by Dr. Lorenzo Minola, **Dr. Cesar Azorin-Molina** and Dr. Deliang Chen.
- [7] ANDRES-MARTIN, M.: Tendencias de la velocidad del viento en superficie en el norte de la Península Antártica y su relación con modos de variabilidad climática. *Universidad Complutense de Madrid, Madrid, Spain. Master thesis of Science.* Directed by **Dr. Cesar Azorin-Molina.** and Dr. Encarna Serrano Mendoza.
- [6] LARA ZAMBRANO, J.: *Tendencias de la velocidad media del viento en Ecuador.* Department of Geography, University of Valencia, Valencia, Spain. Master thesis of Science. Directed by **Dr. Cesar Azorin-Molina** and Dr. Maria Jose Estrela-Navarro
- [5] BEDOYA VALESTT, S.: *Tendencias de la velocidad de la brisa marina en el este de la Península Ibérica, 1961-2019.* Polytechnic University of Valencia, Valencia, Spain. Master thesis of Science. Directed by **Dr. Cesar Azorin-Molina**
- [4] UTRABO-CARAZO, E.: *Trends in the near-surface mean wind speed and gusts over the Iberian Peninsula and its connection with modes of climate variability in the Euro-Atlantic sector, 1961-2019.* *Universidad Complutense de Madrid, Madrid, Spain. Master thesis of Science.* Directed by **Dr. Cesar Azorin-Molina** and Dr. Encarna Serrano Mendoza.
- [3] WESSELSCHMIDT, N.: *Near-surface wind speed trends from different reanalysis datasets.* Earth Sciences Centre, Regional Climate Group, University of Gothenburg, Göteborg, Sweden. Master thesis of Science. 30 August 2017. Maxima Cum Laude Directed by **Dr. Cesar Azorin-Molina** and Dr. Deliang Chen.
- [2] MINOLA, L.: *Homogenization, assessment and attribution of observed near-surface wind speed trends across Sweden, 1956-2013.* Earth Sciences Centre, Regional Climate Group, University of Gothenburg, Göteborg, Sweden. Master thesis of Science. 2 June 2015. Maxima Cum Laude. Directed by **Dr. Cesar Azorin-Molina** and Dr. Deliang Chen.
- [1] ZAKI, S.: Spatial and temporal comparison of different vegetation indices and satellite datasets in the Iberian Peninsula. Master thesis of Science. CIHEAM. 24 de octubre de 2012. Máxima Cum Laude. Directed by Dr. Sergio M. Vicente-Serrano and **Dr. Cesar Azorin-Molina.**

Supervision of contracts and visitors

* 3 Postdoctoral contracts APOSTD (by the Valencian Regional Government) funded but declined by the candidates (due to the delay in the resolution)

CIAPOS/2023/040 Alejandro Vichot Llano
 CIAPOS/2021/236 Devanil Choudhury
 APOSTD/2021/369 Gangfeng Zhang

[14] LI, H.: PhD student from the Sun Yat-sen University (China). Oct-2024 till Oct-2025.

[13] POGGI, M.: PhD student from the University of Buenos Aires (Argentina). Oct-Nov 2024.

[12] PASHAIE, Z.: PhD student from the University of Tabriz (Iran). January - June 2024.

- [11] SHEN, C.: PhD student from the University of Gothenburg (Sweden). November 2023.
- [10] YANG, W.: PhD student from the Beijing Normal University (China). Oct-2023 till Oct-2024.
- [9] MARTINEZ, M.: Observed wind speed gridded product. Hired by the PTI+Clima CSC2300000. CIDE (CSIC-UV-GVA), Valencia. Since 15/11/2023.
- [8] MINOLA, L.: Postdoctoral fellow from the University of Gothenburg (Sweden). Two periods: September 2022 till November 2022; September 2023 till November 2023.
- [7] PLAZA, N.: Observed wind speed gridded product. Hired by the AICO/2021/023 and PTI+Clima CSC2300000. CIDE (CSIC-UV-GVA), Valencia. Since September 2022.
- [6] KHORCHANI, M.: Observed wind speed gridded product. Hired by the AICO/2021/023. CIDE (CSIC-UV-GVA), Valencia. January 2022 – June 2022.
- [5] ZHOU, C.: Postdoc fellowship on homogenization and wind speed variability and wind extremes in the framework of the FORMAS – A Swedish Research Council for Sustainable Development - 2019-00509: «Assessing centennial wind speed variability from a historical weather data rescue project in Sweden». RCG-University of Gothenburg, Gothenburg (Sweden). 01/06/2021-31/12/2022.
- [4] ANDRES-MARTIN, A.: Evaluación de la variabilidad climática de la velocidad del viento en la Antártida. Beca JAE-INTRO 20_01279. CIDE (CSIC-UV-GVA), Valencia. 01/10/2020-28/02/2021.
- [3] BEDOYA-VALESTT, S.: Hired by the RyC grant + RTI2018-095749-A-I00 projects. CIDE (CSIC-UV-GVA), Valencia. 15/06/2020-15/09/2022.
- [2] DENG, K.: Postdoc fellowship on wind speed variability and wind extremes in the framework of the VR Project #2017-03780 (Swedish Research Council): «Detection and attribution of changes in extreme wind gusts over land». RCG-University of Gothenburg, Gothenburg (Sweden). 01/09/2019-31/08/2021.
- [1] REIG-GRACIA, F.: Calibración y georreferenciación de imágenes NOAA-AVHRR mediante programación IDL. IPE-CSIC, Zaragoza. 01/01/2012-31/12/2013.

11. PARTICIPATION IN RESEARCH PROJECTS

11.1. INTERNATIONAL RESEARCH PROJECTS

[15]

PROJECT TITLE: «Red española e iberoamericana sobre variabilidad climática y servicios climáticos en ecosistemas terrestres y marinos» RED-CLIMA 2

FINANCIAL ENTITY: Spanish National Research Council (CSIC). The International Laboratory in Global Change. LINGGLOBAL Ref. LINGG24042

LENGHT FROM: jul-2024 **TO:** dec-2026

PRINCIPAL INVESTIGATORS: Dr. Cesar Azorin-Molina (Spanish CSIC)

FUNDING: 37.500 €

[14]

PROJECT TITLE: «Red española e iberoamericana sobre variabilidad climática y servicios climáticos en ecosistemas terrestres y marinos» RED-CLIMA

FINANCIAL ENTITY: Spanish National Research Council (CSIC). The International Laboratory in Global Change. LINGLOBAL Ref. INCGLO0023

LENGHT FROM: 2021 TO: 2023

PRINCIPAL INVESTIGATORS: Dr. Cesar Azorin-Molina (CIDE, CSIC-UV-GVA)

FUNDING: 29.941 €

[13]

PROJECT TITLE: «Changes in extreme winds and their impact on coastal areas across mid- and high- European latitudes»

FINANCIAL ENTITY: Swedish Research Council – Vetenskapsrådet (VR) 2021-00444

LENGHT FROM: 2022 TO: 2024

PRINCIPAL INVESTIGATORS: Dr. Lorenzo Minola (University of Gothenburg)

FUNDING: 306.199,83 €

[12]

PROJECT TITLE: «Assessing centennial wind speed variability from a historical weather data rescue project in Sweden»

FINANCIAL ENTITY: FORMAS – A Swedish Research Council for Sustainable Development - 2019-00509

LENGHT FROM: 2020 TO: 2022

PRINCIPAL INVESTIGATORS: Dr. Cesar Azorin-Molina (CIDE, CSIC-UV-GVA) and Dr. Erik Engström (SMHI)

FUNDING: 278.614,33 €

[11]

PROJECT TITLE: «High resolution climate modelling with a focus on convection and associated precipitation over the Third Pole Region»

FINANCIAL ENTITY: World Climate Research Programme (WCRP) - CORDEX

LENGHT FROM: 2019 TO: 2023

PRINCIPAL INVESTIGATOR: Dr. Deliang Chen (University of Gothenburg)

FUNDING: *No allocated funding

[10]

PROJECT TITLE: «Detection and attribution of changes in extreme wind gusts over land»

FINANCIAL ENTITY: Swedish Research Council – Vetenskapsrådet (VR) 2017-03780

LENGHT FROM: 2018 TO: 2021

PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina (University of Gothenburg)

FUNDING: 356.595,60 €

[9]

PROJECT TITLE: «Towards improved understanding of the worldwide decline of wind speed in a climate change scenario (STILLING)»

FINANCIAL ENTITY: European Commission

LENGHT FROM: 2016 TO: 2018

PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina (University of Gothenburg)

FUNDING: 185.857,20 €

[8]

PROJECT TITLE: «Assessment of the global stilling phenomenon under a climate change scenario in Sweden»

FINANCIAL ENTITY: Swedish Research Council and Formas – University of Gothenburg
LENGHT FROM: 2015 TO: 2018
PRINCIPAL INVESTIGATOR: Dr. Deliang Chen (University of Gothenburg)
CO-PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina (University of Gothenburg)
FUNDING: 422.466 €

[7]

PROJECT TITLE: «Preventing and remediating degradation of soils in Europe through land care - RECARE»
FINANCIAL ENTITY: European Union. FP7-ENV-2013- TWO STAGE Ref. 603498
LENGHT FROM: 2013 TO: 2018
PRINCIPAL INVESTIGATOR: Dr. Artemi Cerdà (University of Valencia) – Coordinated with Wageningen University.
FUNDING: 8.549.525 €

[6]

PROJECT TITLE: «Demonstration and validation of innovative methodology for regional climate change adaptation in the Mediterranean area - MEDACC»
FINANCIAL ENTITY: LIFE12 ENV/ES/000536
LENGHT FROM: 2013 TO: 2017
PRINCIPAL INVESTIGATORS: Dr. Sergio M. Vicente-Serrano (IPE-CSIC); Dr. Gabriel Borrás (OCCC)
FUNDING: 2.548.841 €

[5]

PROJECT TITLE: «Assessment of climate change impacts on the quantity and quality of water in mountains - ACQWA»
FINANCIAL ENTITY: European Union. 7th Framework Programme
LENGHT FROM: 2009 TO: 2013
PRINCIPAL INVESTIGATORS: Dr. José María García Ruiz (IPE-CSIC); Dr. Martin Beniston (University of Geneva)
FUNDING: 7.000.000 €

[4]

PROJECT TITLE: «A European approach to GEOSS - EuroGEOSS»
FINANCIAL ENTITY: European Commission
LENGHT FROM: 2009 TO: 2012
PRINCIPAL INVESTIGATORS: Dr. Sergio M. Vicente-Serrano (IPE-CSIC); Dr. Francis Bertrand
FUNDING: 6.888.296 €

[3]

PROJECT TITLE: «Regional Cooperation towards adaptation to Climate Change – REGIOCLIMA»
FINANCIAL ENTITY: European Union. Programme INTERREG IVC
LENGHT FROM: 2008 TO: 2011
PRINCIPAL INVESTIGATOR: Dr. Millan Millan (representative of The CEAM Foundation)
FUNDING: 30.000 €

[2]

PROJECT TITLE: «Creating a knowledge and innovation community to address climate change mitigation and adaptation – CLIMATE - KIC»
FINANCIAL ENTITY: European Institute of Innovation and Technology (EIT)
LENGHT FROM: 2010 TO: 2013

PRINCIPAL INVESTIGATOR: Dr. Millan Millan (representative of The CEAM Foundation)

FUNDING: 764.500.000 €

[1]

PROJECT TITLE: «Strategic tools to support adaptive, integrated water resource management under changing conditions at catchment scale a co-evolutionary approach»

FINANCIAL ENTITY: European Commission. Fifth framework programme. EVK1-2001-00149

LENGTH FROM: 2002 TO: 2004

PRINCIPAL INVESTIGATOR: Dr. Paul Jeffrey (University of Cranfield) and Dr. Antonio Escarré (University of Alicante)

FUNDING: 1.504.532 €

11.2. NATIONAL RESEARCH PROJECTS

[25]

PROJECT TITLE: «Evaluación del papel del viento en los incendios forestales mediante el uso de datos masivos e inteligencia artificial - VENTAFOCS»

FINANCIAL ENTITY: Programa Momentum

LENGTH FROM: 15/12/2024 TO: 14/12/2028

PRINCIPAL INVESTIGATOR: Dr. Juli García Pausas (CIDE, CSIC-UV-GVA); **Dr. César Azorín Molina** (CIDE, CSIC-UV-GVA)

[24]

PROJECT TITLE: «Clima y servicios climáticos»

FINANCIAL ENTITY: Ministerio para Transición Ecológica y el Reto Demográfico. CSC2300000

LENGTH FROM: 2023 TO: 2026

PRINCIPAL INVESTIGATORS: Dr. Sergio M. Vicente Serrano (IPE-CSIC); Dr. Jose M. Gutiérrez (IFCA-CSIC); Dr. David Barriopedro (IGEO-CSIC); **Dr. César Azorín Molina** (CIDE, CSIC-UV-GVA); Dr. Santiago Beguería (EEAD-CSIC)

FUNDING: 6.250.000 €

[23]

PROJECT TITLE: «Mecanismos de las olas de Calor y Sequías en España: el papel de las retroalimentaciones suelo-atmósfera y la dinámica atmosférica (MECASE)»

FINANCIAL ENTITY: Ministerio de Ciencia, Innovación y Universidades. PID2022-137244OB-I00

LENGTH FROM: 2023 TO: 2026

PRINCIPAL INVESTIGATORS: Dr. Sergio M. Vicente Serrano; **Dr. César Azorín Molina** (CIDE, CSIC-UV-GVA)

FUNDING: 437.500 €

[22]

PROJECT TITLE: «Servicio de monitorización de viento y predicción de sequías de viento para la industria eólica – WIND-ATLAS»

FINANCIAL ENTITY: Agencia Estatal Consejo Superior de Investigaciones Científicas – Proyecto Intramural Ref. 202230I068

LENGTH FROM: 03/11/2022 TO: 31/12/2023

PRINCIPAL INVESTIGATOR: **Dr. César Azorín-Molina**

FUNDING: 5.000 €

[21]

PROJECT TITLE: «Evaluación a largo plazo de los cambios en la CUBierta vegetal en los parques nacionales españoles y su conexión con los procesos de VARIabilidad y cambio CLImático»

FINANCIAL ENTITY: Ministerio para la Transición Ecológica y Reto Demográfico

LENGHT FROM: 01/01/2023 **TO:** 31/12/2026

PRINCIPAL INVESTIGATOR: Dr. Sergio M. Vicente Serrano

FUNDING: 97.462,50 €

[20]

PROJECT TITLE: «Evolución de los incendios a escala global y regional y a distintas escalas temporales según el forzamiento climático - ONFIRE»

FINANCIAL ENTITY: Ministerio de Ciencia e Innovación. Ref. PID2021-123193OB-I00

LENGHT FROM: 01/01/2023 **TO:** 31/12/2025

PRINCIPAL INVESTIGATOR: Dr. Marco Turco (UM)

FUNDING: 150.040,00€

[19]

PROJECT TITLE: «Servicio de monitorización y estimación del viento en el litoral a partir de instrumentación de bajo coste y aprendizaje automático»

FINANCIAL ENTITY: NextGenerationEU – GVA-THINKINAZUL/2021/018

LENGHT FROM: 01/07/2022 **TO:** 31/12/2025

PRINCIPAL INVESTIGATOR: Dr. César Azorín Molina (CIDE, CSIC-UV-GVA)

CO-PRINCIPAL INVESTIGADOR: Dr. Verónica Nieves (UV)

FUNDING: 204.957,69€

[18]

PROJECT TITLE: «Stilling vs. reversal: proyecciones de la velocidad del viento en el siglo XXI y oscilaciones atmósfera-océano asociadas»

FINANCIAL ENTITY: Fundación BBVA. Beca Leonardo a Investigadores y Creadores Culturales 2021

LENGHT FROM: 01/07/2021 **TO:** 31/12/2022

PRINCIPAL INVESTIGATOR: Dr. César Azorín Molina (CIDE, CSIC-UV-GVA)

FUNDING: 39.951 €

[17]

PROJECT TITLE: «Cartografía de alta resolución espacial del manto de nieve y su variabilidad reciente en los PPNN de montaña, y los impactos del cambio climático para el horizonte 2050»

FINANCIAL ENTITY: Ministerio para la Transición Ecológica y el reto demográfico

LENGHT FROM: 01/01/2021 **TO:** 31/12/2023

PRINCIPAL INVESTIGATOR: Dr. Juan I. López Moreno (IPE-CSIC)

FUNDING: 60.418,70 €

[16]

PROJECT TITLE: «Red de seguimiento de la biodiversidad y del cambio climático»

FINANCIAL ENTITY: Fundación Biodiversidad F.S.P.

LENGHT FROM: 01/03/2020 **TO:** 28/02/2021

PRINCIPAL INVESTIGATOR: Dr. Francesco de Bello (CIDE, CSIC-UV-GVA)

FUNDING: 69.866 €

[15]

PROJECT TITLE: «Evaluación y atribución de la variabilidad de la velocidad media y las rachas máximas de viento: causas del fenómeno “stilling” - IBER-STILLING»

FINANCIAL ENTITY: Ministerio de Ciencia e Innovación. RTI2018-095749-A-I00

LENGHT **FROM:** 2019 **TO:** 2021

PRINCIPAL INVESTIGATOR: Dr. César Azorín Molina (CIDE, CSIC-UV-GVA)

FUNDING: 108.900 € + 1 PhD student (*Eduardo Utrabo-Carazo)

[14]

PROJECT TITLE: «Evaluación del impacto en las series de temperatura de las transiciones entre sistemas de observación - IMPACTRON»

FINANCIAL ENTITY: Ministerio de Economía y Competitividad. CGL2015-70192-REDT

LENGHT **FROM:** 2016 **TO:** 2017

PRINCIPAL INVESTIGATOR: Dr. Enric Aguilar Anfrons (Universitat Rovira i Virgili)

FUNDING: 20.000 €

[13]

PROJECT TITLE: «Red de variabilidad y cambio climático - RECLIM»

FINANCIAL ENTITY: Ministerio de Economía y Competitividad. CGL-2014-517221-REDT

LENGHT **FROM:** 2015 **TO:** 2016

PRINCIPAL INVESTIGATOR: Dr. Sergio M. Vicente-Serrano (CSIC)

FUNDING: 20.000 €

[12]

PROJECT TITLE: «Estudio del manto de nieve en la montaña española y su respuesta a la variabilidad y cambio climático - IBERNIEVE»

FINANCIAL ENTITY: Ministerio de Economía y Competitividad. CGL-2014-52599P

LENGHT **FROM:** 2015 **TO:** 2018

PRINCIPAL INVESTIGATOR: Dr. Juan-I. López-Moreno (CSIC)

FUNDING: 178.000 €

[11]

PROJECT TITLE: «El glaciar de Monte Perdido: Monitorización y estudio de su dinámica actual y procesos criosféricos asociados como indicadores de procesos de cambio global»

FINANCIAL ENTITY: Ministerio de Agricultura, Alimentación y Medio Ambiente 844/2013

LENGHT **FROM:** 2014 **TO:** 2016

PRINCIPAL INVESTIGATOR: Dr. Juan-I. López-Moreno (CSIC)

FUNDING: 64.500 €

[10]

PROJECT TITLE: «Glacier retreat in the Cordillera Blanca and Cordillera Huaytapallana in Perú: Evidences and impacts on local population»

FINANCIAL ENTITY: CSIC para el Desarrollo – ICOOP89

LENGHT **FROM:** 2012 **TO:** 2013

PRINCIPAL INVESTIGATOR: Dr. Juan-I. López-Moreno (CSIC)

FUNDING: 17.900 €

[9]

PROJECT TITLE: «Hidrología nival en el Pirineo Central español: variabilidad espacial, importancia hidrológica y su respuesta a la variabilidad y cambio climático (HIDRONIEVE)»

FINANCIAL ENTITY: Ministry of Economy and Competitiveness. CGL2011-27536

LENGHT **FROM:** 2012 **TO:** 2014

PRINCIPAL INVESTIGATOR: Dr. Juan-I. López-Moreno (CSIC)

FUNDING: 74.000 €

[8]

PROJECT TITLE: «Impactos hidrológicos del calentamiento global en España (HIDROCAES)»

FINANCIAL ENTITY: Ministry of Economy and Competitiveness. CGL2011-27574-C02-02

LENGHT FROM: 2012 TO: 2014

PRINCIPAL INVESTIGATOR: Dr. Sergio-M. Vicente-Serrano (CSIC)

FUNDING: 45.000 €

[7]

PROJECT TITLE: «Influencia del cambio climático en el turismo de nieve»

FINANCIAL ENTITY: Comunidad de Trabajo de los Pirineos. CTPP01/10

LENGHT FROM: 2011 TO: 2012

PRINCIPAL INVESTIGATOR: Dr. Juan I. López Moreno (CSIC)

FUNDING: 34.960 €

[6]

PROJECT TITLE: «Procesos de formación de ozono y evaluación de estrategias de mejora de la calidad del aire - PROMECA»

FINANCIAL ENTITY: Ministry of Science and Innovation. CGL2009-10309

LENGHT FROM: 2010 TO: 2012

PRINCIPAL INVESTIGATOR: Dr. Nuria Castell-Balaguer (The CEAM Foundation)

FUNDING: 59.000 €

[5]

PROJECT TITLE: «Evaluación del agua de niebla en la vertiente mediterránea de la Península Ibérica. Potenciales usos y aplicaciones»

FINANCIAL ENTITY: Ministry of Science and Innovation. CGL2008-04550/CLI

LENGHT FROM: 2009 TO: 2011

PRINCIPAL INVESTIGATOR: Dr. Maria-Jose Estrela-Navarro (The CEAM Foundation – University of Valencia)

FUNDING: 93.000 €

[4]

PROJECT TITLE: «Programa de actividades de la red RIMARC (Red Ibérica Mediterránea para el análisis de los riesgos climáticos)»

FINANCIAL ENTITY: Ministry of Education and Science.

LENGHT FROM: 2008 TO: 2009

PRINCIPAL INVESTIGATOR: Dr. Maria-Jose Estrela-Navarro (The CEAM Foundation)

FUNDING: 12.000 €

[3]

PROJECT TITLE: «Varimos: vigilancia ambiental densa mediante redes inalámbricas de motas con sensores. Aplicación a un problema medioambiental en entornos urbanos»

FINANCIAL ENTITY: Ministry of Industry, Tourism and Trade. TSI-020100-2008-350

LENGHT FROM: 2008 TO: 2009

PRINCIPAL INVESTIGATOR: Enrique Mantilla-Iglesias (The CEAM Foundation)

FUNDING: 10.615,50 €

[2]

PROJECT TITLE: «Multidisciplinary Research Consortium on Gradual and Abrupt Climate Changes; and their Impacts on the Environment (GRACCIE)»

FINANCIAL ENTITY: Ministry of Education and Science. CONSOLIDER-INGENIO 2010 – Programme CSD2007-00067

LENGHT FROM: 2007 TO: 2011

PRINCIPAL INVESTIGATOR: Dr. Joan Grimalt-Obrador (CSIC)

FUNDING: 1.659.235 €

[1]

PROJECT TITLE: «Red Ibérica Mediterránea para el análisis de los riesgos climáticos - RIMARC»

FINANCIAL ENTITY: Ministry of Education and Science. CGL2004-21663-E/CLI

LENGHT FROM: 2003 TO: 2007

PRINCIPAL INVESTIGATOR: Dr. Maria-Jose Estrela-Navarro (The CEAM Foundation)

FUNDING: 18.000 €

11.3. REGIONAL RESEARCH PROJECTS

[3]

PROJECT TITLE: «Potential effects of anthropogenic climate warming on wind storm hazards: detection, attribution and prediction of downbursts»

FINANCIAL ENTITY: Valencian Regional Government – GVA. PROMETEO Grant CIPROM/2023/38 for Excellence Research Groups.

LENGHT FROM: 01-Sep-2024 TO: 31-Aug-2028

PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina (CIDE, CSIC-UV-GVA)

FUNDING: 600.000 €

[2]

PROJECT TITLE: «Cambios observados, proyecciones futuras e índices de la velocidad del viento y sus extremos en la Comunidad Valenciana»

FINANCIAL ENTITY: Valencian Regional Government – GVA. AICO-Program AICO/2021/023

LENGHT FROM: 2021 TO: 2023

PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina (CIDE, CSIC-UV-GVA)

FUNDING: 89.858,69 €

[1]

PROJECT TITLE: «Las sequías climáticas en la cuenca del Ebro y su respuesta hidrológica: estimación del tiempo de respuesta y recuperación en un contexto de cambio climático»

FINANCIAL ENTITY: Aragon Regional Government – DGA Caixa

LENGHT FROM: 2009 TO: 2010

PRINCIPAL INVESTIGATOR: Dr. Sergio-M. Vicente-Serrano (CSIC)

FUNDING: 45.000 €

12. PARTICIPATION IN RESEARCH CONTRACTS OF SPECIAL RELEVANCE WITH COMPANIES AND/OR PRIVATE OR PUBLIC FUNDING BODIES

[6]

CONTRACT TITLE: «Predicción de la velocidad media del viento a corto plazo con IA en Torreveja - TWindPRED»

FINANCIAL ENTITY: University of Alicante (UA, TI-LAB) & Torreveja City Council

LENGHT FROM: 2025 TO: 2025

PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina (CIDE, CSIC-UV-GVA)

CO-PRINCIPAL INVESTIGATOR: Dr. Marcos Martinez-Roig (CIDE, CSIC-UVA-GVA)

FUNDING: 17.989,60 €

[5]

CONTRACT TITLE: «Diagnóstico de la contaminación atmosférica del término municipal de Valencia en el marco del plan estratégico de la calidad del aire»

FINANCIAL ENTITY: Valencia City Council

LENGHT FROM: 2008 **TO:** 2009

PRINCIPAL INVESTIGATOR: Enrique Mantilla-Iglesias (The CEAM Foundation)

FUNDING: 50.000 €

[4]

CONTRACT TITLE: «Previozono 2009. Programa de vigilancia del ozono troposférico »

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: Jan-2009 **TO:** Dec-2009

PRINCIPAL INVESTIGATOR: Enrique Mantilla-Iglesias (The CEAM Foundation)

FUNDING: 90.000 €

[3]

CONTRACT TITLE: «Previozono 2008. Programa de vigilancia del ozono troposférico »

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: Jan-2008 **TO:** Dec-2008

PRINCIPAL INVESTIGATOR: Enrique Mantilla-Iglesias (The CEAM Foundation)

FUNDING: 90.000 €

[2]

CONTRACT TITLE: «Estudio y evaluación de la contaminación atmosférica por ozono troposférico en España»

FINANCIAL ENTITY: Ministry of Environment and Rural and Marine. ES272004

LENGHT FROM: 2005 **TO:** 2009

PRINCIPAL INVESTIGATOR: Dr. Millan Millan (The CEAM Foundation)

FUNDING: 988.894,21 €

[1]

CONTRACT TITLE: «Atles Toponimic Valenciá: Provincia d´Alacant»

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: 2003 **TO:** 2004

PRINCIPAL INVESTIGATOR: Dr. Juan-Antonio Marco-Molina (University of Alicante)

FUNDING: 17.369 €

13. TECHNOLOGY TRANSFERENCE ACTIVITIES

[5]

TECHNOLOGY TRANSFERENCE ACTIVITY: «Technical maintenance of the Valencian Meteorological Stations Network», which consists 30 remote and 2 manual weather stations in the Valencia region.

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: June 2009 **TO:** December 2010

PRINCIPAL INVESTIGATOR: David-Corell-Custardoy (The CEAM Foundation)

[4]

TECHNOLOGY TRANSFERENCE ACTIVITY: «Technical maintenance of the Valencian Fog Collectors Network», which consists 9 remote weather stations in the Valencia region. This is the first fog collector network all around the Iberian Peninsula.

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: June 2009 **TO:** December 2010

PRINCIPAL INVESTIGATOR: David-Corell-Custardoy (The CEAM Foundation)

[3]

TECHNOLOGY TRANSFERENCE ACTIVITY: «Technical installation and maintenance of the Mediterranean Fog Collectors Network», which consists 11 remote weather stations in the eastern region of the Iberian Peninsula (from Catalunya to Almeria). This is the first fog collector network covering the entire eastern fringe of the Iberian Peninsula.

FINANCIAL ENTITY: Ministry of Innovation and Science

LENGHT FROM: June 2009 **TO:** December 2010

PRINCIPAL INVESTIGATOR: David-Corell-Custardoy (The CEAM Foundation)

[2]

TECHNOLOGY TRANSFERENCE ACTIVITY: «Technical re-calibration of rain gauges in laboratory because of over/under reading»

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: June 2009 **TO:** December 2010

PRINCIPAL INVESTIGATOR: David-Corell-Custardoy (The CEAM Foundation)

[1]

TECHNOLOGY TRANSFERENCE ACTIVITY: «Technical re-calibration of anemometers in laboratory because mechanical damage»

FINANCIAL ENTITY: Valencia Regional Government

LENGHT FROM: June 2009 **TO:** December 2010

PRINCIPAL INVESTIGATOR: David-Corell-Custardoy (The CEAM Foundation)

14. STAYS IN RECOGNIZED RESEARCH CENTRES

14.1. INTERNATIONALS

[6]

CENTRE: The Royal Netherlands Meteorological Institute (KNMI)

PLACE: De Bilt **COUNTRY:** The Netherlands **YEAR:** Nov 2016-Feb 2017 **LENGHT:** 4-months

TOPIC: Rescuing long-term wind speed datasets from the ECA&D project

KEY: Postdoctoral – Marie Curie secondment

COLLABORATION WITH: Dr. Albert Klein Tank ; albert.klein.tank@knmi.nl

[5]

CENTRE: Earth Science Centre. Regional Climate Group. University of Göteborg

PLACE: Göteborg **COUNTRY:** Sweden **YEAR:** September 2016- August 2019

LENGHT: 2-years and 8 months (with 4-months of secondment at KNMI)

TOPIC: Towards improved understanding of the worldwide decline of wind speed in a climate change scenario (STILLING)

KEY: Postdoctoral – Marie Curie and VR project

COLLABORATION WITH: Dr. Deliang Chen; deliang@gvc.gu.se

[4]

CENTRE: The Commonwealth Scientific and Industrial Research Organisation (CSIRO)

PLACE: Canberra **COUNTRY:** Australia **YEAR:** Mar-May 2015 **LENGHT:** 3-months

TOPIC: Long-term trends of wind gusts in the Iberian Peninsula

KEY: Postdoctoral

COLLABORATION WITH: Dr. Tim R. McVicar ; Tim.McVicar@csiro.au

[3]

CENTRE: The Royal Netherlands Meteorological Institute (KNMI)**PLACE:** De Bilt **COUNTRY:** The Netherlands **YEAR:** Aug-Dec 2010 **LENGHT:** 5-months**TOPIC:** A numerical study of non-forecasted convection associated with sea breezes**KEY:** Postdoctoral**COLLABORATION WITH:** Dr. Sander Tijm ; sander.tijm@knmi.nl

[2]

CENTRE: Cooperative Institute for Research in the Atmosphere (CIRA). Colorado State University**PLACE:** Fort Collins **COUNTRY:** Colorado State (USA) **YEAR:** 2006 **LENGHT:** 4-months**TOPIC:** Sea breeze cloud frequency composites using remote sensing data (NOAA-AVHRR)**KEY:** Ph.D.Student**COLLABORATION WITH:** Dr. Bernadette H. Connell ; Bernie.Connell@colostate.edu

[1]

CENTRE: Earth Science Centre. Regional Climate Group. University of Göteborg**PLACE:** Göteborg **COUNTRY:** Sweden **YEAR:** 2005 **LENGHT:** 4-months**TOPIC:** Objective methods for finding sea breeze episodes**KEY:** Ph.D.Student**COLLABORATION WITH:** Dr. Deliang Chen ; deliang@gvc.gu.se

14.2. NATIONALS

[2]

CENTRE: Laboratory of Climatology. Group of Climatology. University of Barcelona**PLACE:** Barcelona **COUNTRY:** Spain **YEAR:** 2004-2005 **LENGHT:** 9-months**TOPIC:** Regional teleconnection patterns: Western Mediterranean Oscillation Index (WeMOi)**KEY:** Ph.D. Student**COLLABORATION WITH:** Dr. Javier Martin-Vide ; jmartinvide@ub.edu

[1]

CENTRE: Laboratory of Climatology. Group of Climatology. University of Barcelona**PLACE:** Barcelona **COUNTRY:** Spain **YEAR:** 2003-2004 **LENGHT:** 5-months**TOPIC:** Statistical methods for studying the degree of occurrence and persistence of sea breezes**KEY:** Ph.D.Student**COLLABORATION WITH:** Dr. Javier Martin-Vide ; jmartinvide@ub.edu

15. TEACHING EXPERIENCE

[13]

LECTURER: Azorín Molina, C.**COURSE:** "Wind studies at the Villena-Las Virtudes weather station" – 32 students from the University of Gothenburg (Sweden) – Prof. Alexander Walther and Prof. Bengt Liljebladh**TYPE OF PRESENTATION:** Teaching**MEETING PLACE:** Villena (Alicante, Spain)**DATE:** 18-19/12/2023

[12]

LECTURER: Azorín Molina, C.**COURSE:** "Estación meteorológica Villena-Las Virtudes" Jornada de Convivencia del CIDE (CSIC-UV-GVA)**TYPE OF PRESENTATION:** Teaching

MEETING PLACE: Villena (Alicante, Spain)

DATE: 25/10/2022

[11]

LECTURER: Azorín Molina, C.

COURSE: "Desert Room – Laboratorio de Clima " Escápate con la Ciencia. Semana de la Ciencia

TYPE OF PRESENTATION: Teaching

MEETING PLACE: Valencia (Spain)

DATE: 2-8/11/2021

[10]

LECTURER: Azorín Molina, C.

COURSE: "Estacions meteorològiques automàtiques: L'adquisició de dades del temps per als estudis climàtics" en "Conèixer el temps i clima per a una societat sostenible"

TYPE OF PRESENTATION: Teaching - Part-time assistant professor

MEETING PLACE: Valencia (Spain)

DATE: 24-26/06/2016

[9]

LECTURER: Azorín Molina, C.

COURSE: El clima i el seu estudi a través de estacions meteorològiques. Programa La Nau Gran.

TYPE OF PRESENTATION: Teaching - Part-time assistant professor

MEETING PLACE: Valencia (Spain)

DATE: 28/11/2015 (12 hours)

[8]

LECTURER: Azorín Molina, C.

COURSE: Master International of Land and Water Management – Course «Sustainable Land and Water Management, Spain (Wageningen UR code WRM-33306»

TYPE OF PRESENTATION: Teaching - Part-time assistant professor

MEETING PLACE: Wageningen University (The Netherlands)

DATE: June 2015 (10 hours)

[7]

LECTURER: Azorín Molina, C.

COURSE: Introducción a la Geografía

TYPE OF PRESENTATION: Teaching History degree (1st Course) - Part-time assistant professor

MEETING PLACE: University of Valencia (Spain)

DATE: 01/02/2014 - 31/05/2014 (90 hours)

[6]

LECTURER: Azorín Molina, C.

COURSE: III Curso Intensivo de Verano de la AEC sobre técnicas y métodos estadísticos avanzados para estudios climáticos

TYPE OF PRESENTATION: Teaching practice - «Análisis de imágenes de satélite. Estimación y clasificación de nubes».

MEETING PLACE: University of Zaragoza – CSIC/AEC (Zaragoza, Spain)

DATE: 29/06/2009 - 3/07/2009

[5]

LECTURER: Azorín Molina, C., Olcina Cantos, J., and Moltó Mantero, E.

COURSE: Conèixer el nostre clima y predir el temps

TYPE OF PRESENTATION: Teaching
MEETING PLACE: University of Alicante (Alicante, Spain)
DATE: Academic course 2006-2007.

[4]

LECTURER: Azorín Molina, C.,
COURSE: Clima y vegetación
TYPE OF PRESENTATION: Teaching
MEETING PLACE: State School – Aitana Alicante (Alicante, Spain)
DATE: 27/03/2006 – 29/03/2006

[3]

LECTURER: Azorín Molina, C., Olcina Cantos, J., and Moltó Mantero, E.
COURSE: Conèixer el nostre clima y predir el temps
TYPE OF PRESENTATION: Teaching
MEETING PLACE: University of Alicante (Alicante, Spain)
DATE: Academic course 2005-2006.

[2]

LECTURER: Olcina Cantos, J., Azorín Molina, C., and Martínez Ibarra, E.
COURSE: II Curso de Verano de la AEC. Métodos y técnicas de análisis de riesgos climáticos
TYPE OF PRESENTATION: Teaching practice - «Análisis de áreas de inundación y cartografía del riesgo»
MEETING PLACE: The CEAM Foundation. Paterna (Valencia, Spain)
DATE: 30/06/2004 - 3/07/2004

[1]

LECTURER: Azorín Molina, C.
COURSE: Climatology / Meteorology – Bachelor of Geography
TYPE OF PRESENTATION: Teaching practice
MEETING PLACE: Laboratory of Climatology. University of Alicante (Alicante, Spain)
DATE: 2003-2006

16. INVITED LECTURES

[27]

LECTURER: Azorin-Molina, C.
TITLE: «Downbursts y cambio climático»
CONGRESS: Downburst project meeting
MEETING PLACE: Casa de la Ciencia del CSIC – Valencia (Spain)
DATE: 04/04/2025

[26]

LECTURER: Azorin-Molina, C.
TITLE: Keynote speaker «The forgotten part of climate change: winds of change»
CONGRESS: NIWA seminars
MEETING PLACE: National Institute of Water and Atmosphere (NIWA) – Wellington (New Zealand)
DATE: 20/02/2025

[25]

LECTURER: Azorin-Molina, C.

TITLE: Keynote speaker «Una visión sobre la PTI+ Clima»

CONGRESS: IV Jornadas Científicas PTI+ Salud Global

MEETING PLACE: Science Park – University of Valencia (Spain)

DATE: 28/10/2024

[24]

LECTURER: Azorin-Molina, C.

TITLE: Keynote speaker «Plataforma Temática Interdisciplinar (PTI+) Clima y Servicios Climáticos»

CONGRESS: XXVI Jornadas Científicas de la Asociación Meteorológica Española – 22º Encuentro Hispano – Luso de Meteorología

MEETING PLACE: Cádiz – San Fernando

DATE: 13/03/2024

[23]

LECTURER: Azorin-Molina, C.

TITLE: «El viento, el elemento olvidado del cambio climático»

CONGRESS: Ciclo de conferencias. Villena en la frontera del conocimiento

MEETING PLACE: Sede Universitaria UA de Villena

DATE: 01/03/2024

[22]

LECTURER: Azorin-Molina, C.

TITLE: «El viento, el elemento olvidado del sistema climático»

CONGRESS: Ciclo de conferencias. Las múltiples caras del cambio climático

MEETING PLACE: Casa de la Ciencia CSIC, Valencia

DATE: 01/02/2024

Visit of the Spanish Ministry of Science, Innovation and Universities: Diana Morant

[21]

LECTURER: Azorin-Molina, C.

TITLE: «Los vientos y el cambio climático»

CONGRESS: SAPIencia – Una copa con la ciencia

MEETING PLACE: Centro Aragónés, Sagunto

DATE: 19/01/2024

[20]

LECTURER: Azorin-Molina, C.

TITLE: «Postdoctoral funding opportunities»

CONGRESS: I Jornadas de Jóvenes Investigadores del Clima de la AEC

MEETING PLACE: Casa de la Ciencia CSIC, Valencia

DATE: 15/12/2023

[19]

LECTURER: Azorin-Molina, C.

TITLE: «Cambios en la velocidad del viento: Los fenómenos “stilling” y “reversal” y sus implicaciones socioeconómicas y ambientales»

CONGRESS: Seminarios Científico-Técnicos IVIA & CIDE (CSIC-UV-GVA) & GVA

MEETING PLACE: Moncada (Valencia)

DATE: 26/03/2021

[18]

LECTURER: Azorin-Molina, C.**TITLE:** «Wind speed variability and extremes»**CONGRESS:** The 1st BNU (China)-Europe climate workshop**MEETING PLACE:** Beijing Normal University (Beijing, China)**DATE:** 31/10/2020

[17]

LECTURER: Azorin-Molina, C.**TITLE:** «Estaciones meteorológicas: adquisición de datos del tiempo para el estudio del clima»**CONGRESS:** CIDE Seminar (online)**MEETING PLACE:** Centro de Investigaciones sobre Desertificación (CIDE, CSIC-UV-GVA), Moncada-Valencia (Spain)**DATE:** 16/07/2020

[16]

LECTURER: Anna Pons (Directora del CEACV), **César Azorin-Molina (CIDE, CSIC-UV-GVA)**, José A. Alloza (CEAM), Paula Tuzón (Secretaria Autonómica de Emergencia Climática)**TITLE:** Webinar «Cap a la nova normalitat verda»**CONGRESS:** Webinar Día Mundial del Medio Ambiente**MEETING PLACE:** Webinar Online**DATE:** 05/06/2020**URL LINK:** <https://attendee.gotowebinar.com/recording/4288536659874535692>

[15]

LECTURER: Azorin-Molina, C.**TITLE:** «State-of-the-art of climate variability and trends of wind speeds and extremes: a reversal in global terrestrial stilling»**CONGRESS:** Seminarios Científico-Técnicos CIDE (CSIC-UV-GVA)**MEETING PLACE:** Centro de Investigaciones sobre Desertificación (CIDE, CSIC-UV-GVA), Moncada-Valencia (Spain)**DATE:** 26/03/2020

[14]

LECTURER: Azorin-Molina, C.**TITLE:** «Past and current climate research, with focus on wind and the “stilling” phenomenon»**CONGRESS:** CIDE Seminar**MEETING PLACE:** Centro de Investigaciones sobre Desertificación (CIDE, CSIC-UV-GVA), Moncada-Valencia (Spain)**DATE:** 12/09/2019

[13]

LECTURER: Azorin-Molina, C.**TITLE:** «Assessing anemometer drift as a partial cause of the stilling phenomenon: A statistical approach to correct biases in wind speed series »**CONGRESS:** Parallel Data Analysis Workshop - IMPACTRON network Final Event**MEETING PLACE:** Center for Climate Change C3, Universitat Rovira i Virgili, Vilaseca, Tarragona (Spain)**DATE:** 07/11/2017

[12]

LECTURER: Azorin-Molina, C. together with C. Fleming (Chalmers) and P. Matos (UGOT)

TITLE: «Postdoc opportunities: Marie Curie Individual Fellowship»
CONGRESS: PhD Day – Panel discussion moderated by Göran Broström
MEETING PLACE: Faculty of Science – University of Göteborg, Göteborg (Sweden)
DATE: 5/04/2017

[11]

LECTURER: Azorin-Molina, C.
TITLE: «Past and current climate research, with focus on wind and the STILLING Project»
CONGRESS: Regional Climate Group's Seminar
MEETING PLACE: Department of Earth Sciences – University of Göteborg, Göteborg (Sweden)
DATE: 28/10/2016

[10]

LECTURER: Azorín Molina, C.
TITLE: «Variabilidad climática del viento y el fenómeno stilling»
CONGRESS: IV Encuentro de Aficionados a la Meteorología de Beniarrés
MEETING PLACE: Joan Fuster – Beniarrés (Alicante)
DATE: 21/05/2016

[9]

LECTURER: Azorín Molina, C.
TITLE: «Estudios sobre la variabilidad climática del viento»
CONGRESS: I Encuentro Emeritense de Climatología
MEETING PLACE: Centro Universitario de Mérida (Mérida, Spain)
DATE: 15/09/2015

[8]

LECTURER: Azorín Molina, C.
TITLE: «Global Stilling y tendencias climáticas de la velocidad del viento en España y Portugal»
CONGRESS: Seminario
MEETING PLACE: Instituto de Hidráulica Ambiental de la Universidad de Cantabria (Santander)
DATE: 12/02/2015

[7]

LECTURER: Azorín Molina, C.
TITLE: «Climatología de la nubosidad a partir del sensor AVHRR (1979-2010). Impacto en la variabilidad climática, hidrológica y vegetal en Aragón»
CONGRESS: Seminar «Charlas del Instituto Pirenaico de Ecología»
MEETING PLACE: Instituto Pirenaico de Ecología - CSIC (Zaragoza, Spain)
DATE: 07/04/2011

[6]

LECTURER: Corell-Custardoy, D., and Azorín Molina, C.
TITLE: «Red de colectores de agua de niebla de la Fundación CEAM»
CONGRESS: Seminar «Charlas del Instituto Universitario CEAM-UMH»
MEETING PLACE: Centro de Estudios Ambientales del Mediterráneo (Paterna, Valencia, Spain)
DATE: 16/09/2010

[5]

LECTURER: Azorín Molina, C.
TITLE: «Brisa marina y estados del cielo en Alicante»
CONGRESS: Seminar «Clima y paisaje en Alicante, entre la realidad y el mito»

MEETING PLACE: Alicante (Spain)

DATE: 10/03/2006

[4]

LECTURER: Azorin-Molina, C.

TITLE: «Methodological approach to the study of daily persistence and occurrence of the sea breeze in Alicante (Spain)»

CONGRESS: Workshop of the Regional Climate Group

MEETING PLACE: Göteborg (Sweden)

DATE: 01/12/2005

[3]

LECTURER: Azorin-Molina, C.

TITLE: «Sea breeze study in Spain»

CONGRESS: D-Seminar of the Regional Climate Group

MEETING PLACE: Göteborg (Sweden)

DATE: 28/11/2005

[2]

LECTURER: Celdrán Bernabeu, M.A., and Azorín Molina, C.

TITLE: «Condiciones climáticas y producción industrial de sal en Torrevieja»

CONGRESS: Seminar «Cambio climático, peligros naturales y sociedad del riesgo»

MEETING PLACE: Torrevieja (Alicante, Spain)

DATE: 23/09/2005

[1]

LECTURER: Azorín Molina, C.

TITLE: «Qué significan las nubes. Predicción del tiempo»

CONGRESS: Seminar «VOLCAM»

MEETING PLACE: Mutxamel (Alicante, Spain)

DATE: 04/07/2003

17. EXPERIENCE IN ORGANIZATION R&D ACTIVITIES (Congresses, seminars, etc., scientific-technologicals)

[14]

CONGRESS: *Downburst y cambio climático – Aplicación web Downburst MXO – Presentación del Meteodrone*

FINANCIAL ENTITY: CIDE (CSIC-UV-GVA) y Climatoc-Lab

PARTICIPANTS: CSIC, AVAMET and general public

LENGHT, FROM: 14th April 2025 **TO:** 14th April 2025

PLACE: *Casa de la Ciencia del CSIC en Valencia*

PRINCIPAL INVESTIGATOR: Dr. Cesar Azorin-Molina

[13]

CONGRESS: *13rd Annual Meeting of the Spanish Climatological Society*

FINANCIAL ENTITY: Spanish Climatological Society

PARTICIPANTS: Complutense University of Madrid and IGEO-CSIC

LENGHT, FROM: 22nd January 2025 **TO:** 24th January 2025

PRINCIPAL INVESTIGATOR: Dr. J. Fidel Gonzalez Rouco

CO-CONVENER SESSION 1. OBSERVATIONS: Dr. Cesar Azorin-Molina

[12]

CONGRESS: *EGU General Assembly 2025*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.3 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2024 **TO:** 2nd May 2025

PRINCIPAL CONVENER: Dr. Nuria P. Plaza-Martin

CO-CONVENERS: Dr. Lorenzo-Minola, Dr. Xiaolan Wang, Dr. Rob Roebeling, Dr. Cesar Azorin-Molina

[11]

CONGRESS: *EGU General Assembly 2024*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.5 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2023 **TO:** 19th April 2023

PRINCIPAL CONVENER: Dr. Lorenzo Minola

CO-CONVENERS: Dr. Cesar Azorin-Molina, Dr. Xiaolan Wang, Dr. Rob Roebeling, Dr. Corrado Motta

[10]

CONGRESS: *EGU General Assembly 2023*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL3.1.3 Regional climate extremes: detection, modelling, attribution, and uncertainties

LENGHT, FROM: 1st September 2022 **TO:** 28th April 2023

PRINCIPAL CONVENER: Dr. Chunlüe Zhou

CO-CONVENERS: Dr. Deliang Chen, Dr. Wenhong Li, Dr. Cesar Azorin-Molina, Dr. Yaoming Ma

[9]

CONGRESS: *EGU General Assembly 2023*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.5 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2023 **TO:** 28th April 2023

PRINCIPAL CONVENER: Dr. Lorenzo Minola

CO-CONVENERS: Dr. Cesar Azorin-Molina, Dr. Xiaolan Wang, Dr. Rob Roebeling

[8]

CONGRESS: *CLIVAR 2023: Towards and Integrated View of Climate. Sesión 2. Observación climática y técnicas de reconstrucción instrumental del clima*

FINANCIAL ENTITY: CLIVAR

LENGHT, FROM: November 2022 **TO:** January 2023

PRINCIPAL CONVENER: Dr. Cesar Azorin-Molina

CO-CONVENERS: Dra. Dhais Peña-Angulo, Miquel Tomás-Burguera

CLIVAR Exchanges

[7]

CONGRESS: *EGU General Assembly 2022*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.03 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2021 **TO:** 31st May 2022

PRINCIPAL CONVENER: Dr. Lorenzo Minola

CO-CONVENERS: Dr. Cesar Azorin-Molina, Dr. Xiaolan Wang, Dr. Rob Roebeling

[6]

CONGRESS: *EGU General Assembly 2021*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.03 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2020 **TO:** 30th April 2021

PRINCIPAL CONVENER: Dr. Xiaolan Wang

CO-CONVENERS: Dr. Cesar Azorin-Molina, Dr. Enric Aguilar, Dr. Rob Roebeling

[5]

CONGRESS: *EGU General Assembly 2020*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.03 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2019 **TO:** 8th May 2020

PRINCIPAL CONVENER: Dr. Cesar Azorin-Molina

CO-CONVENERS: Dr. Xiaolan Wang, Dr. Enric Aguilar, Dr. Rob Roebeling

[4]

CONGRESS: *EGU General Assembly 2019*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.03 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2018 **TO:** 12 April 2019

PRINCIPAL CONVENER: Dr. Cesar Azorin-Molina

CO-CONVENERS: Dr. Xiaolan Wang, Dr. Enric Aguilar, Dr. Rob Roebeling

[3]

CONGRESS: *EGU General Assembly 2018*

FINANCIAL ENTITY: European Geosciences Union

PARTICIPANTS: European Geosciences Union. Session: CL5.03 Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes

LENGHT, FROM: 1st September 2017 **TO:** 13 April 2018

PRINCIPAL CONVENER: Dr. Xiaolan Wang

CO-CONVENERS: Dr. Rob Roebeling, Dr. Petr Stepanek, Dr. Enric Aguilar, Dr. Cesar Azorin-Molina

[2]

CONGRESS: *10th Annual Meeting of the Spanish Climatological Society*

FINANCIAL ENTITY: Spanish Climatological Society

PARTICIPANTS: University of Alicante

LENGHT, FROM: 1st January 2016 **TO:** 31st October 2016

PRINCIPAL INVESTIGATOR: Dr. Jorge Olcina-Cantos

NUMBER OF RESEARCHERS: 10

[1]

CONGRESS: Segundas Jornadas de Meteorología y Climatología del Mediterráneo Occidental – IJMCMO.

FINANCIAL ENTITY: Ministry of Science and Innovation – CGL2009-07949-E

PARTICIPANTS: The CEAM Foundation and University of Valencia

LENGHT, FROM: 1st January 2010 **TO:** 31st December 2010

QUANTITY: 8.000 euros

PRINCIPAL INVESTIGATOR: Dr. Jose-Luis Palau-Aloy

NUMBER OF RESEARCHES: 5

18. EXPERIMENTAL CAMPAIGNS (selected)

[7]

Scientific field campaign – designing and flying a “Meteodrone” & intercomparison of wind sensors in New Zealand and Spain. February 2025 until August 2025.

[6]

Scientific field campaign – weather station networks in high-elevation areas - Tibet Region - Himalaya (China). Lhasa (China). 04-16 August 2019.

[5]

Glacier retreat monitoring in the Cordillera Blanca and Cordillera Huaytapallana in Perú.

Project: “Glacier retreat in the Cordillera Blanca and Cordillera Huaytapallana in Perú: Evidences and impacts on local population”. Huaraz and Huancayo (Perú). June 2012.

[4]

Snow distribution measurements using a long range terrestrial laser scanner (TLS). Project: “Hidrología nival en el Pirineo Central español”. Izas and Panticosa (Huesca, Spain). Since 2011 until now.

[3]

Remote SO₂ and NO₂ mass flux measurements using COSPEC. Project: “Desarrollo de una nueva Tecnología de Vigilancia y Control de Focos de contaminación atmosférica”. Andorra (Teruel, Spain). May 2009.

[2]

NO₂ measurements using passive dosimetry. Project: “Diagnóstico de la contaminación atmosférica del término municipal de Valencia en el marco del plan estratégico de la calidad del aire”. Valencia (Valencia, Spain). December-March 2009.

[1]

Atmospheric soundings. Project: “Estudio y evaluación de la contaminación atmosférica por ozono troposférico en España”. Puertollano (Ciudad Real, Spain). June 2008

19. INSTRUMENTATION EXPERIENCE

Dataloggers:

CR3000; CR1000; CR800; CR510; CR200; ZENO 3200; OPUS 10

Wind Speed and Direction:

Windsonic (Opt.1 and 4) – Gill Instruments LTD; Gill Microvane & 3 Cup Anemometer Model 12005 – Gill Instruments LTD; 03002 – R.M. Young Company; 05103-45-5 – R.M. Young Company; 7914 – Davis Instruments

Radiation:

Pyranometer CM3 – Kipp&Zonnen; Pyranometer LI200Z – LI-COR Biosciences; Albedometer CMA-6 – Kipp&Zonnen; NR-LITE-L – Kipp&Zonnen

Air Temperature and Relative humidity:

HMP45A probe – Vaisala ; HMP50Y probe – Vaisala ; HMP155 probe – Vaisala ; MP100A probe - Campbell Scientific ; 107 probe – Campbell Scientific ; PCE-HT71 – PCE Iberica; OPUS 10 TSE;

Rain:

52203 tipping bucket – Young Company; 7852M tipping bucket – Davis Instruments; 3029/5 – Précis Mécanique; Raingauge SBS500H; Geonor T-200B; Hellmann raingauge 120 and 200 cm²

Atmospheric pressure:

BP1 Barometric Pressure Sensor – Adcon Telemetry

Snow-depth:

SR50A Sonic Ranging Sensor – Campbell Scientific

Surface temperature:

IR100/IR120 Infrared Remote Temperature Sensor

Fog:

Cylindrical fog water instrument (i.e. omnidirectional collection efficiency) based on the ASRC (Atmospheric Science Research Centre, State University of New York) string collector.

* I am currently responsible (installation and maintenance) of the Automatic Weather Stations (AWS) in the Pyrenees / Central System from the Pyrenean Institute of Ecology IPE-CSIC (PI Juan-Ignacio Lopez-Moreno); and four AWS in Villena (Alicante, Spain) involved in AVAMET (<https://www.avamet.org/>).

20. OTHER ACHIEVEMENTS

20.1. CURRENT AND PAST RESEARCH GROUP MEMBER & RESEARCH TEAMS

- **Group leader of the Climate, Atmosphere and Ocean Lab (Climatoc-Lab).** Desertification Research Centre – Spanish National Research Council (CIDE, CSIC-UV-GVA). Founded in 2019.
*Consolidated Research Group awarded by the Valencian Regional Government, AICO/2021/023 (2021-2023)
*Excellence Research Group awarded by the Valencian Regional Government, CIPROM/2023/38 (2024-2028)
- Member of the Laboratory of Climatology. University Institute of Geography. University of Alicante. Director: Jorge Olcina-Cantos.
- Member of the Group of Climatology (2014 SGR 300 – Catalan Regional Government) of the University of Barcelona. Director: Javier Martin-Vide.
- External Member of the Regional Climate Group. Earth Sciences Centre. University of Göteborg. Director: Deliang Chen.
- Associated Researcher of the Laboratory of Meteorology-Climatology. University Institute CEAM-UMH. Director: Maria-Jose Estrela-Navarro.
- Member of the Soil Erosion and Degradation Research Group (SEDER). Director: Artemi Cerdà.
- Member of the Excellence Research Group: “Geomorfología y cambio global”. Aragon Regional Government.
- Member of the ISTI Parallel Observations Science Team (POST):
- Member of the Land surface wind speed’s team of the “State of the Climate” – Bull. Amer. Meteor. Soc., American Meteorological Society.
- Member of the Climate Indicator Bulletins’s team (CIBs) of the Royal Netherlands Meteorological Institute (KNMI) for the World Meteorological Organization.
- Member of the C3S (Copernicus Climate Change Service) Data Rescue Community - Atmospheric Circulation Reconstructions over the Earth (ACRE) - European Centre for Medium-Range Weather Forecasts.
- Member of the PTI-Climate and Climate Services. Spanish National Research Council.
- CSIC representative in climate change during the “Visit of CSIC to the Joint Research Centre (JRC) – European Commission” in Ispra (Italy), 5-6 October 2023.
- Co-Principal CSIC representative in the Climate-KIC. Since March 2024

20.2. ASSOCIATIONS RESEARCH - MEMBER

- Member – N° 192 of the Spanish Climatological Society. Since 1999 – Until 2021.

- Member – Spanish Geographers Society. Since 2002 – Until 2008.
- Member of the Group of Climatology – Spanish Geographers Society. Since 2002 – Until 2008.
- Member of the American Geophysical Union (AGU). Since 2014. * Temporary
- Member of the European Geophysical Union (EGU). Since 2018. * Temporary
- Member – N° 141 of the l'Associació Valenciana de Meteorologia Josep Peinado (AVAMET). Since 2015.

20.3. EDITOR OF SCIENTIFIC JOURNALS

- Editorial board of the «Revista de Climatología» (ISSN 1578-8768). Since Oct. 2006 – Until 2021.
- Editorial board of the «Advances in Meteorology» (ISSN 1687-9309). Since April 2015 – Until 2019.
- Editorial board of the «PLOS ONE» (ISSN 1932-6203). Since May 2018
- Editorial board of the «Atmosphere» (ISSN 2073-4433). Since December 2019
- Editorial board of the «Advances in Climate Change Research» (ISSN 1674-9278). Since Dec. 2020

20.4. REFEREE OF SCIENTIFIC JOURNALS

- Referee of the «Revista de Climatología» (ISSN 1578-8768). Since October 2006.
- Referee of the «Advances in Science and Research». Since October 2007.
- Referee of the «International Journal of Climatology». Since January 2009.
- Referee of the «Pirineos». Since January 2009.
- Referee of the «Journal of Applied Meteorology and Climatology». Since January 2009.
- Referee of the «Atmosfera». Since May 2010.
- Referee of the «Journal of Geophysical Research – Atmospheres». Since May 2011.
- Referee of the «Atmospheric Research». Since June 2011.
- Referee of the «Science of Total Environment». Since March 2012.
- Referee of the «Journal of Atmospheric Sciences». Since April 2012.
- Referee of the «Atmospheric Chemistry and Physics Discussions». Since May 2012.
- Referee of the «Cuadernos de Investigación Geográfica». Since June 2013.
- Referee of the «Thethys». Since January 2014.
- Referee of the «Advances in Meteorology». Since March 2015.
- Referee of the «Land Degradation and Development». Since March 2015.
- Referee of the «Journal of Climate». Since July 2015.
- Referee of the «Global and Planetary Change». Since December 2015.
- Referee of the «Pure and Applied Geophysics». Since December 2015.
- Referee of the «Meteorology and Atmospheric Physics». Since January 2016.
- Referee of the «Advances in Space Research». Since January 2016.
- Referee of the 10th Annual Meeting of the Spanish Climatol.Society. June-September 2016
- Referee of «Climate Research». Since October 2016.
- Referee of «Plos One». Since October 2016.
- Referee of «Quarterly Journal of the Royal Meteorological Society». Since January 2017.
- Referee of «Natural Hazards». Since March 2018.
- Referee of «Geografiska Annaler». Since October 2018.

- Referee of «Climate Dynamics». Since October 2018.
- Referee of «Nature». Since November 2018.
- Referee of «iScience». Since March 2021.

20.5. REFEREE OF SCIENTIFIC RESEARCH PROJECTS

-Referee of the «Agencia Nacional de Evaluación y Prospectiva, ANEP», Earth Sciences. Since April 2010

-Referee of the «Agencia Nacional de Evaluación y Prospectiva, ANEP», Social Sciences. Since October 2015.

-Referee of the «Agencia Andaluza del Conocimiento, Dirección de Evaluación y Acreditación, DEVA», Earth Sciences. Since August 2020.

-Referee of the «Swiss National Science Foundation, SNSF», Div. Mathematics, Physical and Engineering Sciences. Since December 2020.

-Referee of the «United Arab Emirates University, UAEU», Associate Provost for Research. Since December 2022.

-Referee of the «National Science Centre», Poland. Since September 2023.

20.6. REFEREE OF DOCTORAL THESIS AND MASTER THESIS

LEYVA-GARCÍA, E., 2011: *Clasificación objetiva del perfil vertical troposférico en el área sur-occidental del Mediterráneo y su relación con la intrusión de polvo africano*. The Miguel Hernández University of Elx, Alicante (Spain), PhD degree, 312 pp.

ESPINOS-MORATO, H., 2015: *Emisiones difusas: Medidas experimentales y modelización aplicadas a instalaciones de tratamiento de aguas residuales*. University of Valencia, Valencia (Spain), PhD degree, 252 pp.

SANCHEZ ROMERO, A., 2016: *Sunshine duration as a proxy of the atmospheric aerosol content*. University of Girona, Girona (Spain), PhD degree, 204 pp. * External referee

GILABERT, A., 2016: *Assessment of the bias introduced by the automatization of climate records combining climatological and metrological approaches*. University of Rovira i Virgili, Tarragona (Spain), PhD degree, 207 pp. * Chairperson

SORÍ GÓMEZ, R., 2018: *Atmospheric moisture transport: the bridge between ocean evaporation and hydrological extremes in major tropical river basins*. University of Vigo, Ourense (Spain), PhD degree, 186 pp.

LUCIO ECEIZA, E.E., 2018: *Multidecadal to centennial surface wind variability over Northeastern North America*. Complutense University of Madrid, Madrid (Spain), PhD degree, 277 pp. * External referee

PEÑA-GALLARDO, M., 2019: *Drought indices validation: Improving monitoring knowledge on different systems in Spain and the United States*. Universidad de Sevilla, Sevilla (Spain), PhD degree, 193 pp. * External referee.

MARTIN-HERNANDEZ, N., 2019: The use of long-term high-spatial resolution Normalized Difference Vegetation Index (NDVI) to determine different environmental processes in Spain. Universidad de Zaragoza, Zaragoza (Spain), PhD degree, 190 pp.

RAMON-GAMON, J., 2021. High-quality observations for improved seasonal predictions. Implications for the wind energy sector. Universidad de Barcelona, Barcelona (Spain), PhD degree, 181 pp.

CAMACHO-MANCO, JUAN C. 2023. Sistemas Convectivos de Mesoescala sobre el norte de Colombia: una visión desde las simulaciones de Convección Permitida. Universidad de Antioquia, Medellín (Colombia), MSc degree, 179 pp.

20.7. RECRUITMENT COMMITTEE AND OTHER DUTIES

Committee member of the recruitment project nr. 4360. 25/06/2019. Department of Earth Sciences. University of Gothenburg (Sweden). Head of the Committee: Prof. Deliang Chen. Members of the Committee: Dr. Cesar Azorin-Molina and Dr. Céline Heuzé

Committee member of the recruitment project nr. 4361. 20/06/2019. Department of Earth Sciences. University of Gothenburg (Sweden). Head of the Committee: Prof. Deliang Chen. Members of the Committee: Prof. Hans Linderholm, Dr. Heather Reese and Dr. Cesar Azorin-Molina.

Committee member of the recruitment “Dirección de Evaluación y Acreditación de la Agencia Andaluza del Conocimiento” (DEVA-ACC). Postdoc positions 2020. Coordinated by: Luis Gimeno Presa.

Committee member of the recruitment project nr. 2020/6758. 11/01/2021. Department of Earth Sciences. University of Gothenburg (Sweden). Head of the Committee: Prof. Deliang Chen. Members of the Committee: Dr. Cesar Azorin-Molina and Dr. Julia Curio

Committee member of the recruitment project nr. 2021/7173. 06/04/2021. Department of Earth Sciences. University of Gothenburg (Sweden). Head of the Committee: Prof. Deliang Chen. Members of the Committee: Dr. Cesar Azorin-Molina, Dr. Kristina Seftigen and Dr. Keyan Fang.

Committee member of the recruitment “Dirección de Evaluación y Acreditación de la Agencia Andaluza del Conocimiento” (DEVA-ACC). Proyectos de Excelencia 2020. Coordinated by: Luis Gimeno Presa.

Committee member of the recruitment project nr. 2021/7599. 10/06/2021. Department of Earth Sciences. University of Gothenburg (Sweden). Head of the Committee: Prof. Deliang Chen. Members of the Committee: Dr. Cesar Azorin-Molina, and Dr. Kristina Seftigen.

Committee member of the recruitment project nr. 2022/585. 19/05/2022. Department of Earth Sciences. University of Gothenburg (Sweden). Head of the Committee: Prof. Deliang Chen. Members of the Committee: Dr. Cesar Azorin-Molina, Dr. Julia Curio and Dr. Lorenzo Minola.

Head of the committee of the recruitment project Santiago Grisolia – PhD grants. July-August 2022. Spanish National Research Council and Valencian Regional Government.

Secretary member of the recruitment “Dirección de Evaluación y Acreditación de la Agencia Andaluza del Conocimiento” (DEVA-ACC). Proyectos I+D+I – Área TNA. Coordinated by: Sergio M. Vicente Serrano. September 2022.

Secretary member of the recruitment “Escala de Científicos Titulares de los Organismos Públicos de Investigación” BOE N° 161, published on 6 July 2022. Committee Panel #24. Position “Tecnologías físicas para la observación de la Tierra y los océanos”. Geosciences Barcelona (Geo3BCN-CSIC), 21-23 November 2022.

Member of the committee panel of the position “Profesor Titular de Universidad – Geografía Física”, Candidate: Enrique Morán Tejeda. Evaluation # 28/2022. Universitat Illes Balears (Mallorca, Spain), 5 December 2022.

Committee member of the recruitment “Ramón y Cajal 2022” postdoc positions. Area: *Ciencias y Tecnologías Medioambientales*; Subarea: *Clima y Atmósfera*. Spanish Ministry of Science.

Invited by the Spanish King Felipe VI and Queen Letizia of Spain to the gala dinner to the Colombian President Gustavo Francisco Petro at the Royal Palace (Madrid, Spain, 3rd May 2023), in which the climate crisis (including weather extremes) and the energy transition (wind power to decarbonization) were key issues to discuss (as PI of the RED-CLIMA network and collaboration with scientists in Colombia): <https://www.uv.es/uvweb/desertification-research-centre/en/current-news/scientific-representation-gala-dinner-offered-their-majesties-king-queen-spain-occasion-first-state-visit-president-colombia-gustavo-petro-1285923353218/Novetad.html?id=1286315949675>

Secretary member of the recruitment “Titulado Superior Fuera de Convenio, y Titulado Medio fuera de Convenio” – CSIC Jan-Jul 2024.

Secretary at the “Claustro Científico” of the Desertification Research Centre (CIDE, CSIC-UV-GVA), 2023-2026.

Committee member of the “SIMPLIFICA 2” - Working group #5 of the Spanish CSIC, aimed at suggesting improvements for applying and managing internal projects funded by the CSIC.

Scientific Committee of the XIII Spanish Climatology Meeting, Spain. Since October 2024.

Scientific advisor in the “Disaster and Emergency Advisory Group (GADE)” of CSIC for the flooding occurred in Valencia on 29 October 2024.

Secretary member of the committee of the recruitment of PhD grants for GVA funded projects (PROMETEO, CIDEAGENT, etc). December 2024 - January 2025. Spanish National Research Council and Valencian Regional Government.

20.8. OSPA JUDGE FOR THE AGU / EGU MEETING

OSPA Judge for the session "A34C: Improved Understanding of the Surface Energy Balance and the Spatiotemporal Variation of Its Components I". AGU Fall Meeting 2014, San Francisco (USA). 15-19 December 2014.

OSPA Judge for the session "CL5.03: Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes". EGU 2018, Vienna (Austria). 8-13 April 2018.

OSPA Judge for the session "CL5.02: Climate Data Homogenization and Analysis of Climate Variability, Trends and Extremes". EGU 2018, Vienna (Austria). 7-12 April 2019.

20.9. OFFICIAL METEOROLOGICAL OBSERVER

- Official meteorological observer (Villena-Ciudad station, 8007E, Spain) – Spanish Meteorological Agency (AEMET). Since January 1999; Official meteorological observer (Salinas mountain range, Alicante, Spain). Since January 2003; Official meteorological observer (Las Virtudes station, Spain) – The CEAM Foundation. Since January 2008
- Daily collaboration supplying meteorological data to some Spanish TV and Radio Media: Televisió de Catalunya (TV3), Televisió Valenciana (Canal 9), Canal Méteo (Canal Satélite Digital), Telecinco, CNN+, Radio Villena Ser and Flaix FM. January 1999 – December 2007.

20.10. OFFICIAL WEATHER FORECASTER

- Weather forecaster for the Fire Unit of the Alicante Council (Spain), June 2002 – December 2006.
- Weather forecaster in the The Tall Ships' Races. Alicante (Spain), July 4-7th 2007.
- Weather forecaster in the Volvo Ocean Race 2011/2012 for the Groupama Sailing Team:
<http://www.cammass-groupama.com/en/index.jsp>

20.11. DISSEMINATION ON TV, RADIO AND NEWSPAPERS

-Scientific interviews about climatic advice and weather forecast on some Spanish TV and Radio Media: Radio Villena-Cadena Ser and Radio MQR-Cope (April 2003); Televisión Alicantina-Canal 33 (18/07/2003); Canal 9 (19/07/2003); Antena 3-Territorial Comunidad Valenciana (30/07/2003); Antena 3-Nacional (3/08/2003 and 4/08/2003); Antena 3-Territorial Comunidad Valenciana (15/10/2003); Antena 3-Nacional (15/10/2003); Canal 9-Live Noticias 9 from the Laboratory of Climatology (15/10/2003); News Second Edition TVE (15/10/2003); Televisión Alicantina-Canal 33 (15/10/2003); Report "Laboratorio de Climatología" in the Campus Universitari of Punt2 (25/01/2006). Periodical interviews in Radio Media (Cadena Ser, Onda Cero, Cope, Radio 9, etc.) and Newspaper (Diario Información, La Verdad. Las Provincias, El País, Levante, ABC, El Mundo, etc.); Horizon Magazine (05/10/2017): https://horizon-magazine.eu/article/what-happens-world-dying-winds_en.html "The stilling: global wind speeds slowing since 1960". Cosmos Magazine "Climate Watch: Where the Wind Slows" April 2018 written by Michael Lucy. Issue 78, pp 24-25 <https://cosmosmagazine.com/climate/the-wind-is-slowing-down>; "Las Mañanas de RNE" with Mar Lupión, November 2019; 05/01/2020 interviews in "Levante" and "Diario Información" newspapers; 09/02/2021 en Onda Cero Sagunto with Palmira Benajas Medina; 24/05/2022 en Efecto Mariposa Radio (Chile); La Vía Verda – ÁPunt 27/02/2024; Radio Villena Cadena Ser 01/03/2024; MQR Cope 01/03/2024; News article "Las lecciones no aprendidas de la dana" – El País 9/11/2024 <https://elpais.com/ciencia/2024-11-09/las-lecciones-no-aprendidas-de-la-dana.html> ; News article "Eventos climáticos extremos en España: adónde vamos y de dónde venimos" - Agencia SINC 12/11/2024 <https://www.agenciasinc.es/Reportajes/Eventos-climaticos-extremos-en-Espana-adonde-vamos-y-de-donde-venimos> ; News First Edition TVE (12/11/2024); Science Media Centre (09/12/2024), opinion about the Global Threat of Drying Lands: Regional and global aridity trends and future projections (UNCCD): <https://sciencemediacentre.es/la-poblacion-en-zonas-aridas-podria-duplicarse-en-2100-con-el-peor-escenario-de-cambio-climatico> ; RNE 14/04/2025 Aplicación web DOWNBURST MXO and several press media, e.g.: <https://www.levante-emv.com/comunitat-valenciana/2025/04/14/avamet-aplicacion-desarrollada-uv-csic-viento-extremo-reventones-116380686.html> ; <https://www.europapress.es/comunitat-valenciana/noticia-desarrollan-aplicacion-ciencia-ciudadana-detecta-viento-extremo-tiempo-real-20250414103308.html> ; https://www.apuntmedia.es/noticies/societat/una-aplicacio-web-detectara-vents-extrems-temps-real-comunitat-valenciana_1_1780375.html

20.12. ATTENDANCE TO WORKSHOPS

- Workshop "On local scale air quality modelling", using MM5 and TAPM meteorology to drive EMEP air chemistry model. September 29th 2005. Earth Science Centre. RCG (Göteborg).
- Workshop «Daily tropical cyclone discussions». Cooperative Institute for Research in the Atmosphere (CIRA), Regional Mesoscale Meteorology Branch (RAMMB), Fort Collins (Colorado State), June 30th – October 27th 2006, USA.
- Workshop «Daily weather discussions». Cooperative Institute for Research in the Atmosphere (CIRA), Regional Mesoscale Meteorology Branch (RAMMB), Fort Collins (Colorado State), June - September 2006, USA.
- Workshop «Daily weather briefings». Royal Netherlands Meteorological Institute (KNMI), De Bilt (The Netherlands), August - December 2010, The Netherlands.