

Dr Filippo Prischi - CV

<https://filippoprischilab.org>

Employment History

- Oct 2020 – Present:** **Senior Lecturer in Biochemistry**
Jun 2015 – Oct 2020: **Lecturer in Biochemistry**
Since 2019 **Director of Student Recruitment**
University of Essex (UoE), School of Life Sciences (Colchester, UK).
- May 2010 – May 2015:** **Postdoctoral Researcher.**
Department of Life Sciences, Imperial College London (London, UK).
The project I worked on focused on gaining structural and mechanistic insights into components of the Unfolded Protein Response (UPR). -
Group Leader: Dr Maruf Ali.

Qualifications

- Oct 2005 – Feb 2010:** **Ph.D. Biochemistry** – Joint project National Institute for Medical Research - MRC (London, UK) and University of Siena (Siena, Italy) –
Supervisors: Prof Annalisa Pastore & Prof Neri Niccolai.
- Nov 2003 – Sep 2005:** **2 years M.Sc. Molecular and Cell Biology (110 summa cum laude)** –
Supervisor: Prof Neri Niccolai. University of Siena (Siena, Italy).
- Sep 2000 – Nov 2003:** **B.Sc. Biological Sciences (110 summa cum laude)** – *Supervisor: Prof Neri Niccolai.* University of Siena (Siena, Italy).

Accreditations & Training Courses

- Sep 2021:** **Mental Health First Aid course** - Mental Health First Aid (MHFA)
England courses are internationally recognised and accredited. This two-day course trains as a Mental Health First Aider.
- May 2021:** National Scientific Qualification (**Abilitazione Scientifica Nazionale**) -
05/E2 Molecular Biology for Associate Professor (Ministry of Education, University and Research, Italy).
- Jul 2017:** **Fellow of the Higher Education Academy (FHEA)** - The fellowship is a professional recognition accredited by the Higher Education Academy, the UK national body which champions teaching excellence.
- Nov 2013:** **Executive Education in Project Management** - The course is based on the Association for Project Management's Body of Knowledge and offers an effective grounding in project management.
University College London (UCL), London, UK.
- 2006 (1st session)** Italian Professional Practice Exam (**Esame di Stato**) and licensed as a professional biologist

Grants and Awards

- Apr 2022 – June 2022** **University of Essex Rapid and Agile Project Funding** (£49,733.18) - The development of therapeutics for COVID-19 variants. Lead PI: Dr Brooke, Co-Pis **Dr Prischi**, Dr Giotis, Dr Mohr, Dr Zwacka.
- Mar 2022** **French Embassy in London and the British Council Funding for Seed Meetings** - *International cooperation in research between France and the UK.* - Plants in times of climate change. Defining the role of redox and kinase signalling pathways in controlling plant growth under environmental stress. Lead PI Dr Bechtold (Durham University) and Dr Meyer (University

Dr Filippo Prischi - CV

Paris Saclay, Versailles), Consortium **Prischi**, Mullineaux (UoE), Smirnov (University of Exeter), Reichheld, Bousquet-Antonelli (CNRS, Perpignan), Rouhier (Université de Lorraine, Nancy), Issakidis-Bourguet (Institute of Plant Sciences Paris Saclay), Menand, Field (Aix Marseille Université, Marseille), Gallois, (INRAE Avignon).

- Apr 2019 – Dec 2022** Leverhulme: *Research Grant (£286,928.31)* - Flipping the switch; regulating protein synthesis in response to stress. **Lead PI: Dr Prischi**, Co-I Dr Belchtold.
- Jul 2019** Atomwise *AIMS Award Programme (Nominal value \$385,000)* - Androgen Receptor (AR) (A19-396). Lead PI: Dr Brooke, **Co-PI Dr Prischi**
- Oct 2019 – June 2021** Bicycle Therapeutics (£15,000) - Development of novel cancer treatments: structural studies of Nectin 4 in complex with bespoke anti-cancer peptides. **Lead PI: Dr Prischi**, Co-I Prof Bavro
- Aug 2019 – Apr 2021** Apollo Therapeutics and EIRA *research grant (£50,000)* - Development of specific inhibitors that prevent hnRNPA1-mediated therapy resistance in small cell lung cancer. **PI: Dr Prischi**
- May 2019 – Jun 2019** East Suffolk and North Essex NHS Foundation Trust (£7,700) - ProteinSafe™. **Lead PI: Dr Prischi**, Co-PI Dr Bavro.
- Sept 2017 - Aug 2019** Wellcome Trust: *Seed Awards in Science (£99,825.00)* – Understanding how RSKs regulate Transcription Factors in Triple Negative Breast Cancer. **PI: Dr Prischi**
- 2022** Biochemical Society: *Sponsored Event Grant (£350)*
- 2019** Biochemical Society: *Travel grant (£400)*.
- 2012** Biochemical Society: *Travel grant (£650)*.
- 2007** EMBO: *Short-Term Fellowship (£5,236.64)*.

Competitive Access to International Facilities

- Nov 2022** SACL A (60h beamtime) - High throughput and time-resolved fixed target SFX of metalloproteins. PI Dr Hough. Co-Is **Prischi**, Worrall (UoE), Tews (University of Southampton), Owen, Axford (Diamond Light Source).
- May 2022** SACL A (60h beamtime) - High throughput and time-resolved fixed target SFX of metalloproteins. PI Dr Hough. Co-Is **Prischi**, Worrall (UoE), Tews (University of Southampton), Owen, Axford (Diamond Light Source).
- Feb 2022** SACL A (60h beamtime) - High throughput and time-resolved fixed target SFX of metalloproteins. PI Dr Hough. Co-Is **Prischi**, Worrall (UoE), Tews (University of Southampton), Owen, Axford (Diamond Light Source).
- Jun 2021** SACL A (60h beamtime) - High throughput and time-resolved fixed target SFX of metalloproteins. PI Dr Hough. Co-Is **Prischi**, Worrall (UoE), Tews (University of Southampton), Owen, Axford (Diamond Light Source).
- Jun 2018** X-Chem Diamond Light Source (12h beamtime) - Targeting hnRNPA1 for the treatment of Small Cell Lung Cancer. **PI: Dr Prischi**

Teaching & Supervision

- 2017 – Present** Module Supervisor "BS281 Protein Bioinformatics" (UoE).
- 2017 – 2019** Coordinator of an ERASMUS+ project between the School of Life Sciences (UoE) and the Department of Biotechnology, Chemistry and Pharmacy (University of Siena).
- 2015 – Present** Module Supervisor "BS131 Biochemistry of Macromolecules" (UoE).
- 2005 – 2009** Lecturer "Laboratory of Bioinformatics" (University of Siena).

Dr Filippo Prischi - CV

- I am supervising 3 PhD students at UoE and co-supervising 1 PhD student (Imperial College London).
- I have supervised to successful completion 2 PhD, 30 final year BSc, 11 MSc and 4 MSD students, 1 Research Technician and 2 Postdoctoral Researchers (UoE).
- I have co-supervised to successful completion 2 PhD and 1 MSc students (University of Siena), and 1 PhD student (Imperial College London).
- Since 2019 I'm a member of the PhD examination board for the PhD in Biochemistry and Molecular Biology (BiBiM 2.0) of the University of Siena, and I've examined 5 PhD students.

Consultancy

2020 – 2021	Lecturer "Pharmaceutical Biotechnologies" (Fondazione VITA, Siena, Italy).
2021	Lecturer "Applied Biochemistry" (Fondazione VITA, Siena, Italy).

Publications - <https://scholar.google.co.uk/citations?hl=en&user=j8hfZGIAAAAJ>

1. Barbera, S., Raucci, L., Tassone, G., Tinti, L., **Prischi, F.**, Santucci, A., Mongiat, M., Tosi, GM., Galvagni, F., Dimberg, A., Pozzi, C., Orlandini, M. "Dimerization of the C-type lectin-like receptor CD93 promotes its binding to Multimerin-2 in endothelial cells" *International Journal of Biological Macromolecules*, accepted
2. Chrysostomou, S.* , Roy, R. *, **Prischi, F.***, Thamlikitkul, L., Chapman, K., Mufti, U., Peach, R., Ding, L., Hancock, D., Moore, C., Molina-Arcas, M., Mauri, F., Pinato, D., Abrahams, JL., Ottaviani, S., Castellano, L., Giamas, G., Pascoe, J., Moonamale, D., Pirrie, S., Gaunt, C., Billingham, L., Steven, NM., Cullen, M., Hrouda, D., Winkler, M., Post, J., Cohen, P., Salpeter, SJ., Bar, V., Zundeleovich, A., Golan, S., Leibovici, D., Lara, R., Klug, D.R., Yaliraki, S.N., Barahona, M., Wang, Y., Downward, J., Skehel, JM., Ali, MMU, Seckl, M.J., Pardo, O.E. "Repurposed floxacins targeting RSK4 prevent chemoresistance and metastasis in lung and bladder cancer". *Science Translational Medicine*. 13(602): eaba4627 *contributed equally.
3. Cronin, R., Brooke, GN. §, **Prischi, F**§. "The role of the p90 ribosomal S6 kinase family in prostate cancer progression and therapy resistance." *Oncogene*. *In publication*. §corresponding authors.
4. **Prischi, F**§ and Filippakopoulos, P§. "Editorial: Structural Studies of Protein Complexes in Signalling Pathways." *Frontiers in Molecular Biosciences*. (2021). §corresponding authors.
5. Obomighie, I., Lapenas, K., Murphy, BE., Bowles, A., Bechtold, U. §, **Prischi, F**§. "The Role of Ribosomal Protein S6 Kinases in Plant Homeostasis". *Frontiers in Molecular Biosciences*. 8, 24 (2021). §corresponding authors
6. Deganutti, G., **Prischi, F.**, Reynolds, CA. "Supervised molecular dynamics for exploring the druggability of the SARS-CoV-2 spike protein" *J Comput Aided Mol Des* 35, 195–207 (2021).
7. Brooke, G. § and **Prischi, F.** § "Structural and functional modelling of SARS-CoV-2 entry in animal models". *Sci Rep* 10, 15917 (2020). §corresponding authors.
8. Trezza, A., Iovinelli, D., Santucci, A., **Prischi, F.** § and Spiga, O. § "An integrated drug repurposing strategy for the rapid identification of potential SARS-CoV-2 viral inhibitors". *Sci Rep* 10, 13866 (2020). §corresponding authors.
9. Spiga, O., Cicaloni, V., Fiorini, C., Trezza, A., Visibelli, A., Millucci, L., Bernardini, G., Bernini, A., Marzocchi, B., Braconi, D., **Prischi, F.**, Santucci, A. "Machine Learning application for development of a data-driven predictive model able to investigate Quality of Life scores in a rare disease". *Orphanet Journal of Rare Diseases*. 12;15(1):46 (2020)
10. **Prischi, F.** & Pastore, A. "Hybrid methods in iron-sulfur cluster biogenesis". *Frontiers in Molecular Biosciences*. 4, 12 (2017).
11. Zabet, N. R., Catoni, M., **Prischi, F.**, Paszkowski, J. " Cytosine methylation at CpCpG sites triggers accumulation of non-CpG methylation in gene bodies". *Nucleic Acid Research*. 45, 3777–3784 (2017).
12. **Prischi, F.** & Pastore, A. "Application of nuclear magnetic resonance and hybrid methods to structure determination of complex systems". *Advances in Experimental Medicine and Biology*. 896:351-368 (2016).

Dr Filippo Prischi - CV

13. Carrara, M., **Prischi, F.**, Nowak, P., Ali, M.M. "Crystal Structures of Perk Luminal Domains Reveal Transient Tetramer State Important for ER Stress Signaling". *EMBO Journal*. 34(11):1589-600 (2015).
14. Popovic, M., Sanfelice, D., Pastore, C., **Prischi, F.**, Temussi, P.A., Pastore, A. "Selective observation of the disordered import signal of a globular protein by in-cell NMR: The example of frataxins". *Protein Science*. 24(6):996-1003 (2015).
15. Carrara, M., **Prischi, F.**, Nowak, P., Kopp, M.C., Ali, M.M. "Noncanonical binding of BiP ATPase domain to Ire1 and Perk is dissociated by unfolded protein CH1 to initiate ER stress signaling". *eLife*. 4:e03522 (2015).
16. **Prischi, F.**, Nowak, P., Carrara, M., Ali, M.M. "Phosphoregulation of human Ire1 RNase splicing activity". *Nature Communication*. 5, 3554 (2014).
17. Carrara, M., **Prischi, F.**, Ali, M.M. "UPR signal activation by luminal sensor domains". *International Journal of Molecular Sciences*. 14(3):6454-66 (2013)
18. Bernini, A., Spiga, O., Venditti, V., **Prischi, F.**, Botta, M., Croce, G., Tong, A.P., Wong, W.T., Niccolai, N. "The use of a ditopic Gd(III) paramagnetic probe for investigating α -bungarotoxin surface accessibility". *Journal of Inorganic Biochemistry*. 112:25-31 (2012)
19. **Prischi, F.**, Konarev, P.V., Iannuzzi, C., Pastore, C., Adinolfi, S., Martin, S.R., Svergun, D.I., Pastore, A. "Structural bases for the interaction of frataxin with the central components of iron-sulphur cluster assembly". *Nature Communication*. 1, 95 (2010).
20. **Prischi, F.**, Pastore, C., Carroni, M., Iannuzzi, C., Adinolfi, S., Temussi, P., Pastore, A. "Of the vulnerability of orphan complex proteins: the case study of the E. coli IscU and IscS proteins". *Protein Expression and Purification*. 73(2):161-6 (2010).
21. **Prischi, F.**, Giannini, C., Adinolfi, S., Pastore, A. "The N-Terminus of human frataxin is an intrinsically unfolded region". *FEBS J*. 276(22):6669-76 (2009).
22. Adinolfi, S., Iannuzzi, C., **Prischi, F.**, Pastore, C., Iametti, S., Martin, S.R., Bonomi, F., Pastore, A. Bacterial frataxin "CyaY is the gatekeeper of iron-sulfur cluster formation catalyzed by IscS". *Nat Struct Mol Biol*. 16(4):390-6 (2009).
23. Bernini, A., Venditti, V., Spiga, O., Ciutti, A., **Prischi, F.**, Consonni, R., Zetta, L., Arosio, I., Fusi, P., Guagliardi, A., Niccolai, N. "NMR studies on the surface accessibility of the archaeal protein Sso7d by using TEMPOL and Gd(III)(DTPA-BMA) as paramagnetic probes". *Biophys Chem*. 137(2):71-5 (2008).
24. Venditti, V., Bernini, A., De Simone, A., Spiga, O., **Prischi, F.**, Niccolai, N. "MD and NMR studies of alpha-bungarotoxin surface accessibility". *Biochem Biophys Res Commun*. 356(1):114-7 (2007).
25. Spiga, O., Padula, M.G., Scarselli, M., Ciutti, A., Bernini, A., Venditti, V., **Prischi, F.**, Falciani, C., Lozzi, L., Bracci, L., Valensin, P.E., Caudai, C., Niccolai, N. "Structurally driven selection of human hepatitis C virus mimotopes". *Antivir Ther*. 11(7):917-22 (2006).
26. Bernini, A., Spiga, O., Venditti, V., **Prischi, F.**, Bracci, L., Tong, A.P., Wong, W.T., Niccolai, N. "NMR studies of lysozyme surface accessibility by using different paramagnetic relaxation probes". *J Am Chem Soc*. 128(29):9290-1(2006).
27. Bernini, A., Spiga, O., Ciutti, A., Venditti, V., **Prischi, F.**, Governatori, M., Bracci, L., Lelli, B., Pileri, S., Botta, M., Barge, A., Laschi, F., Niccolai, N. "NMR studies of BPTI aggregation by using paramagnetic relaxation reagents". *BBA*. 1764(5):856-62 (2006).
28. Bernini, A., Spiga, O., Venditti, V., **Prischi, F.**, Bracci, L., Huang, J., Tanner, J.A., Niccolai, N. "Tertiary structure prediction of SARS coronavirus helicase". *Biochem Biophys Res Commun*. 343(4):1101-4 (2006).
29. Spiga, O., Bernini, A., Ciutti, A., Chiellini, S., Menciasci, N., Finetti, F., Causarone, V., Anselmi, F., **Prischi, F.**, Niccolai, N. "Molecular modelling of S1 and S2 subunits of SARS coronavirus spike glycoprotein". *Biochem Biophys Res Commun*. 310(1):78-83 (2003).

Talks & Conferences (last 5 years)

1. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer". BCA/BACG Spring Meeting, 29th Mar – 1st Apr 2021
2. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and

Dr Filippo Prischi - CV

3. bladder cancer". Jain (deemed-to-be) University in Bangalore (India), Feb 5th 2020.
3. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer". St. Joseph's College in Bangalore (India), Feb 6th 2020.
4. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer". PES University in Bangalore (India), Feb 7th 2020.
5. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer". M.S.Ramaiah University of Applied Sciences (India), Feb 7th 2020.
6. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer". University Malaya in Kuala Lumpur (Malaysia), Feb 10th 2020.
7. **Prischi, F.** "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer". Universiti Teknologi MARA System (UiTM) in Kuala Lumpur (Malaysia), Feb 11th 2020.
8. **Prischi, F et al.** . "Targeting RSK4 prevents both chemoresistance and metastasis in lung and bladder cancer", *FEBS congress 2019*, Krakow (Poland), 6-14th Jul 2019.
9. **Prischi, F.** "Targeting hnRNPA1 for the treatment of Small Cell Lung Cancer" *EEMaX symposium*, Norwich, Dec 12th 2018.
10. **Prischi, F.** "Purification of protein kinases for structural studies" *Cambridge AKTA user day*, Cambridge, Sep 21th 2018.

Professional societies & Esteem factors

Professional Societies:

- Since 2020** Member of the *British Crystallographic Association (BCA)*
Since 2016 Member of the *Association of Italian Scientists in the UK (AISUK)*
Since 2016 Member of the *British Biophysical Society (BSS)*.
Since 2010 Member of the *Biochemical Society*.

Professional Societies Committee:

- Since 2021** Member of the Biochemical Society research area committee II: Molecular Structure and Function.
Since 2016 Essex branch coordinator of the *Association of Italian Scientists in the UK (AISUK)*

Academic Editor and Reviewer: <https://publons.com/researcher/1319076/filippo-prischi/>

- Since 2022** Scientific Reports editorial board
2020 - 2022 Associate Editor BMC Molecular and Cell Biology.
Since 2017 PLOS ONE editorial board
Since 2017 Review Editor for Frontiers in Molecular Biosciences.
Since 2017 Reviewer of BBSRC, MRC, Wellcome Trust and Biochemical society grants.

Organisation of Conferences and Seminars:

- June 2023** Organising a 2.5 days Biochemical Society sponsored conference on "Protein dynamics & Transient interactions"
May 2021 Organised the 2021 School of Life Sciences webinar series "Exploring the Science of Life".
May 2020 Organised the 2020 School of Life Sciences webinar series "The Only Way is Science".
20th Dec 2016 Organised the 5th *EEMaX Annual Symposium* at UoE, UK.

Diversity, Equity, and Inclusion

- I am a STEM ambassador registered with STEM Learning.
- I am an LGBT+ role model and I have put effort in my teaching practice and my interactions with staff and colleagues in offering support and championing inclusivity. I believe that visible LGBT+ role models have an active role in creating a truly inclusive workplace and society.
- I'm a trained mentor and I currently have mentees at the University of Essex and University of Siena (via the alumni mentoring program).