

PERSONAL INFORMATION



PROFESSIONAL QUALIFICATIONS

M.D., Specialist in Medical Oncology

WORK EXPERIENCE

1st December 2025 – ongoing

Temporary fellow at IFOM ETS, the AIRC Institute of Molecular Oncology (Milan, Italy), working within the “Metabolic Reprogramming in Solid Tumors program” directed by Prof C. Vernieri.

1st December 2024 – 30th November 2025

One-year fellowship at the Department of Translational Research and New Technologies in Medicine and Surgery at University of Pisa to carry out clinical and research activities in the field of Medical Oncology at the Medical Oncology Department of Pisa University Hospital (Azienda Ospedaliero-Universitaria Pisana).

1st November 2019 – 4th November 2024

Post-graduate medical training in Medical Oncology at Medical Oncology Department of Pisa University Hospital (Azienda Ospedaliero-Universitaria Pisana).

EDUCATION AND TRAINING

1st November 2019 – 4th November 2024

Completion of the 5-year Residency Program in Medical Oncology at the University of Pisa, graduating with full marks (110/110 cum laude).

- This post-graduate medical training included rotations in the Medical Oncology Department at the University Hospital of Pisa (Azienda Ospedaliero-Universitaria Pisana) and attendance at theoretical lessons in medical oncology, supportive care therapies, physician–patient communication, pathology, scientific english, and medical statistics.
- the work was carried out under the supervision of senior physicians. The activities included managing oncological patients in both outpatient and inpatient settings, administering antineoplastic treatments, addressing treatment-related side effects, and providing supportive care interventions.
- Involvement as subinvestigator in clinical trials, gaining experience in the management of patients enrolled in interventional studies, from screening and randomization to treatment and follow up phases.
- Successful completion of the final exam with a grade of 110/110 with honours on 4th November 2024, following the defense of the experimental thesis titled: “The Role of APOBEC3A and APOBEC3B in the Development of APOBEC Mutational Signatures and Resistance to CDK4/6 Inhibitors in ER-Positive, HER2-Negative Breast Cancer”.

1st December 2022 – 14th January 2024

During the 4th year of specialization in Medical Oncology: fellowship at “Translational genomics and targeted therapies in solid tumours” laboratory at IDIBAPS research institute in Barcelona, Spain under the supervision of Prof. Aleix Prat.

- Involvement in clinical, preclinical and translational research on breast cancer.
- Main research project performed during the fellowship: "APOBEC3A and APOBEC3B overexpression in breast cancer cell lines" under the supervision of Fara Brasó Maristany, PhD.
- During the fellowship acquisition of experience in cell culture maintenance and manipulation, including transfection, transduction, viral production and cell viability assays; as well as wet lab techniques, including Western Blot, RNA extractions and gene expression analysis using the nCounter platform (NanoString Technologies). Basic knowledge of GraphPad Prism and R software to perform statistical analyses. Experience in selecting and organizing genomic and clinical data from publicly available datasets (cBioportal, GEO datasets)

1 st April 2019 – 30 th July 2019	Qualifying Internship and Licensing Examination to the profession of physician at "La Sapienza" University of Rome, Italy. Subsequent registration with the Register of Physicians of the Province of Rome, Italy (registration number: M 65255) on 30 th July 2019.
February 2019	<p>1-month internship at the Department of Tumor Pathology, Hamamatsu University School of Medicine in Japan thanks to the award of a placement in the IFMSA SCORE research exchange program.</p> <ul style="list-style-type: none"> ▪ Main focus: research project titled "Molecular epidemiology of human common cancers" under the guidance of Prof. Haruhiko Sugimura and Prof. Zazuya Shinmura. ▪ During the internship gaining of experience in bacterial culture and transformation, plasmid DNA extraction, establishment of stable inducible cell lines expressing a gene of interest, protein extraction and quantification, western blotting and immunofluorescence analysis.
October 2012 – January 2019	<p>Completion of the 6-year master's degree in medicine and surgery with full marks (110/110 cum laude) at "La Sapienza" University of Rome, Italy.</p> <ul style="list-style-type: none"> ▪ Passed exams 38; Total credits (CFU) 360 ▪ Thesis internship at the Laboratory of Molecular Oncology of the university hospital, under the supervision of Prof. Anna Coppa. ▪ Successful completion of the final exam with a grade of 110/110 with honours, following the defense of the experimental thesis titled: "Gene Panel Sequencing for the identification of genetic alterations in hereditary breast and ovarian cancers", supervisor: Prof. Anna Coppa. ▪ During the thesis internship acquisition of experience in DNA extraction and sequencing using Ion Torrent NGS and Sanger method, classification of genetic variants using online databases, in silico prediction softwares, segregation analyses and functional assays.
October 2018	Two-week internship at Imperial College Healthcare NHS Trust, London, UK. Medical Elective placement within Endocrinology and Diabetes Mellitus under the guidance of Dr. Florian Wernig.
August 2018	Internship at Cork University Hospital, Cork, Ireland. Medical Elective placement within Nephrology under the guidance of Dr. Liam Plant.

SKILLS AND COMPETENCE

Medical oncology

Setting up the diagnostic and staging pathway for patients with neoplasms, understanding the indications and limitations of laboratory tests, imaging diagnostics, nuclear medicine, cytology, and histology in various types of cancer. Determining the therapeutic program for patients, assessing treatment efficacy, side effects, and the feasibility of the proposed regimen in inpatient or outpatient settings. Proficiency in utilizing biomarkers as prognostic and predictive indicators for personalized treatment selection. Choosing treatments for complications arising from cytotoxic therapies and providing supportive care for oncology patients. Making clinical decisions within multidisciplinary teams for the planning of integrated treatments.

Clinical research

Experience in the management of patients enrolled in clinical trials from screening and randomization to treatment and follow up phases. Experience with obtaining informed consent from patients, coordinating sample collections as per study protocol, administering experimental medications, reporting adverse events, managing patient follow-up. Skilled in various tools to assess quality of life, capable of assessment of instrumental response as per RECIST criteria and data compilation using eCRF (electronic Case Report Form) and aware of the role and function of Ethics Committees. Experience in collection of clinical data from patients' clinical records and systematic literature review.

Preclinical and translational research

Experience in cell cultures maintenance and manipulation, generation of cell lines expressing a gene of interest using the recombinant lentivirus system, basic knowledge of bacterial culture and transformation techniques, skilled in protein extraction and quantification, western blot, RNA and DNA extraction and quantification, classification of genetic variants using online databases, in silico prediction softwares, segregation analyses and functional assays. Experienced in selecting and organizing genomic and clinical data from publicly available datasets (cBioportal, GEO datasets). Basic knowledge of GraphPad Prism and RStudio to analyse collected data.

PUBLICATIONS

Published articles

Co-authored: Identification of novel BRCA1 large genomic rearrangements by a computational algorithm of amplicon-based Next-Generation Sequencing data. A. Nicolussi, F. Belardinilli, V. Silvestri, Y. Mahdavian, V. Valentini, S. D'Inzeo, M. Petroni, M. Zani, S. Ferraro, S. Di Giulio, F. Fabretti, B. Fratini, A. Gradilone, L. Ottini, G. Giannini, A. Coppa, C. Capalbo. *Peer J* 2019 Nov 15 DOI: 10.7717/peerj.7972. eCollection 2019

Co-authored: PI3K mutations detected in liquid biopsy are associated to reduced sensitivity to CDK4/6 inhibitors in metastatic breast cancer patients. M. Del Re, S. Crucitta, G. Lorenzini, C. De Angelis, L. Diodati, D. Cavallero, I. Bargagna, P. Cinacchi, B. Fratini, B. Salvadori, M. Ghilli, M. Roncella, A. Fontana, R. Danesi, F. Cucchiara *Pharmacol Res.* 2021 Jan;163:105241. doi: 10.1016/j.phrs.2020.105241.

Co-authored: PANHER study: a 20-year treatment outcome analysis from a multicentre observational study of HER2-positive advanced breast cancer patients from the real-world setting. Laura Pizzuti, [...] Elisabetta Landucci, Simonetta Stani, Beatrice Fratini, Paolo Marchetti, Gennaro Ciliberto, Patrizia Vici *Ther Adv Med Oncol* 2021 Nov 29;13:17588359211059873. DOI: 10.1177/17588359211059873.

Co-authored: Adjuvant capecitabine in triple negative breast cancer patients with residual disease after neoadjuvant treatment: real-world evidence from CaRe, a multicentric, observational study. Francesca Sofia Di Lisa, Eriseld Krasniqi, Laura Pizzuti, [...] Andrea Botticelli, Andrea Michelotti, Beatrice Fratini, [...] Marco Mazzotta, Enzo Maria Ruggeri, Rebecca Pedersini, Gennaro Ciliberto and Patrizia Vici. *Front Oncol.* 2023 May 16;13:1152123. DOI: 10.3389/fonc.2023.1152123

Co-authored: A 14-gene B-cell immune signature in early-stage triple-negative breast cancer (TNBC): a pooled analysis of seven studies. Benedetta Conte, Fara Brasó-Maristany, Adela Rodríguez Hernández, Tomás Pascual, Guillermo Villacampa, Francesco Schettini, Maria J. Vidal Losada, Elia Seguí, Laura Angelats, Isabel Garcia-Fructuoso, Raquel Gómez-Bravo, Natàlia Lorman-Carbó, Laia Paré, Mercedes Marín-Aguilera, Olga Martínez-Sáez, Barbara Adamo, Esther Sanfeliu, Beatrice Fratini, Claudette Falato, Núria Chic, Ana Vivancos, Patricia Villagrasa, Johan Staaf, Joel S. Parker, Charles M. Perou, and Aleix Prat. *eBioMedicine* 2024;102:105043

Co-authored: Prevalence and clinical impact of germline pathogenic variants in breast cancer: a descriptive large single-center study. A. Rodríguez-Hernández O. Martínez-Sáez, F. Brasó-Maristany, B. Conte, R. Gómez, I. García-Fructuoso, B. Fratini, E. Seguí, M. Potrony, E. Sanfeliu, S. Cobo, P. Galvan, L. Moreno, E. Grau, M. R. Aceituno, J. A. Puig-Butille, J. Oriola, G. Goberna, P. Blasco, O. Castillo, V. Sirenko, A. Aguirre, M. Vidal, M. Muñoz, T. Ramon, Y. Cajal, F. Balaguer, A. Prat & B. Adamo April 2025 *ESMO Open* 10(4):104543

Abstracts

Co-authored: ABSTRACT 1932MO – ESMO 2020 - Ki67 expression and CDK4/6i activity: An emerging role for PIK3CA mutations in metastatic breast cancer patients M. Del Re, G. Lorenzini, F. Cucchiara, C. De Angelis, S. Crucitta, L. Diodati, D. Cavallero, I. Bargagna, P. Cinacchi, B. Fratini, B. Salvadori, A. Fontana, R. Danesi. *Annals of Oncology*, abstract only, volume 31, supplement 4, s1093, Sept 2020
DOI: <https://doi.org/10.1016/j.annonc.2020.08.1325>

Co-authored: ABSTRACT 307P – ESMO 2021 - Overall survival in metastatic breast cancer patients according to different follow up strategies for early breast cancer. E. Blondeaux, L. Boni, T. Ruelle, V. Di Lauro, C. Molinelli, M. Piezzo, B. Fratini, F. Poggio, P. Pugliese, A. Ferzi, G. Buzzatti, S. Russo, O. Garrone, S. Gasparro, A. D'Alonzo, M. De Laurentiis, A. Fabi, G. Arpino, C. Bighin, L. Del Mastro *Annals of Oncology*, abstract only, volume 32, supplement 5, s497-s498, september 01, 2021 DOI: <https://doi.org/10.1016/j.annonc.2021.08.590>

Co-authored: ABSTRACT A51 - AIOM 2021 - Capecitabine as adjuvant treatment in TNBC patients non achieving pathological complete response after neoadjuvant chemotherapy: a single institution real-life experience. Lorenzini G, Bargagna I, Cinacchi P, Fratini B, Albanese I, Bilancio D, Patané F, Salvadori B, Ferrari P, Landucci E, Franceschi M, Diodati L, Michelotti A, Fontana A, Falcone A. *Tumori Journal Abstract book*, Volume 107, Number 2S, October 2021. [chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://www.aiom.it/wp-content/uploads/2020/11/2021_XXIII_AIOM_tmj.pdf](https://www.aiom.it/wp-content/uploads/2020/11/2021_XXIII_AIOM_tmj.pdf)

Co- Co-authored: ABSTRACT C31 - AIOM 2022 - Trastuzumab Deruxtecan (T-DXd) in HER2 positive (HER2+), advanced breast cancer (ABC): a single institution, real world experience. Bargagna I, Cinacchi P, Fratini B, Lorenzini G, Bilancio D, Patané F, Albanese I, Acconci G, Bianchini G, Pantaleo F, Baldacci E, Fontana A, Michelotti A, Salvadori B, Landucci E, Ferrari P, Masi G. *ABSTRACT AIOM 2022 - C31 Tumori Journal Abstract book*, Volume 108, Number 4S, October 2022. [chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://www.aiom.it/wp-content/uploads/2023/02/2022_XXIV_AIOM_TJ_abstract_book.pdf](https://www.aiom.it/wp-content/uploads/2023/02/2022_XXIV_AIOM_TJ_abstract_book.pdf)

Co-authored: ABSTRACT D50 - AIOM 2023 - Safety results of pembrolizumab plus chemotherapy as neoadjuvant treatment (NACT) in triple negative breast cancer (TNBC) patients (pts): a real-life experience. Patané F, Lorenzini G, Bargagna I, Cinacchi P, Fratini B, Albanese I, Bilancio D, Pantaleo F, Acconci G, Bianchini G, Baldacci E, La Commare M, Allegrini G, Coltelli L, Barletta M.T, Crucitta S, Salvadori B, Fontana A. *Tumori Journal Abstract book*, Volume 109, Number 2S, October 2023. <https://congresso.aiom.it/abstract%2dsubmission/1.105.1>.

Co-authored: ABSTRACT D65 – AIOM 2023 - Predictive role of Ki67 in patients (pts) with advanced breast cancer treated (ABC) with CDK4/6 inhibitors (CDK4/6i): a real-life experience. Cinacchi P, Lorenzini G, Patané F, Bilancio D, Albanese I, Pantaleo F, Bianchini G, Acconci G, Baldacci E, La Commare M, Bargagna I, Fratini B, Crucitta S, Salvadori B, Masi G, Scatena C, Fontana A. *Tumori Journal Abstract book*, Volume 109, Number 2S, October 2023. <https://congresso.aiom.it/abstract%2dsubmission/1.105.1>.

Co-authored: ABSTRACT 3P – ESMO TAT 2024 - Evaluating conversational generative pre-trained transformer (ChatGPT) as a tool in early breast cancer (eBC) cases. F. Patané, F. Palumbo, G. Lorenzini, I. Bargagna, P. Cinacchi, I. Albanese, D. Bilancio, F. Pantaleo, G. Acconci, G. Bianchini, E. Baldacci, M. La Commare, B. Fratini, A. Fontana. *ESMO Open ESMO TAT 2024 Abstract book* Volume 9, Supplement 1102258, February 2024
<https://doi.org/10.1016/j.esmooop.2024.102258>

Co-authored: ABSTRACT 284P -ESMO 2024 - Clinical and molecular characteristics of early-stage triple-negative breast cancer (eTNBC) patients with germline pathogenic variants in homologous recombination repair genes. A. Rodríguez Hernandez, B. Conte, F. Braso Maristany, B. Pastor, B. Fratini, B. Walbaum, M. Potrony, L. Moreno, E. Grau, E. Sanfeliu Torres, O. Martínez Saez, E. Seguí Solís, R. Gómez Bravo, I. García Fructuoso, M.J. Vidal Losada, T. Ramon y Cajal, M. Muñoz, F. Balaguer, A. Prat, B. Adamo *Annals of Oncology* (2024) 35 (suppl_2): S309-S348. 10.1016/annonc/annonc1577

Co-authored: ABSTRACT E67- AIOM 2024 - Predictive Factors of Complete Pathological Response to Neoadjuvant Chemo-Immunotherapy Treatment in Patients with Early Triple Negative Breast Cancer. Bianchini G, Fontana A, Scatena C, Bargagna I, Lorenzini G, Cinacchi P, Fratini B, Albanese I, Bilancio D, Patané F, Acconci G, Baldacci E, Pantaleo F., Christou E, Crucitta S, Ferrari P, Landucci E, Salvadori B, Roncella M, Bengala C. *Tumori Journal Abstract book*, Volume 110, Issue 2_suppl, November 2024, <https://doi.org/10.1177/03008916241277279>

Co-authored: Abstract P1-03-01 – SABCS 2024 -Towards Universal Germline Screening for Breast Cancer, Planning for a Sustainable Future A Single-Center Retrospective Analysis. Adela Rodríguez, Fara Brasó-Maristany, Benedetta Conte, Olga Martínez-Sáez, Miriam Potrony, Lorena Moreno, Elia Grau, Esther Sanfeliu, Raquel Gómez, Isabel García, Beatrice Fratini, Elia Seguí, Maria Vidal, Montserrat Muñoz, Teresa Ramón y Cajal, Francesc Balaguer, Aleix Prat, Barbara Adamo.

First Author: ABSTRACT E37 – AIOM 2025: Clinical Predictors of ESR1 Mutations and Elacestrant activity in endocrine resistant ER+/HER2- metastatic breast cancer (MBC): A Real-World Study. Fratini B, Christou E, Bilancio D, Albanese I, Pantaleo F, Acconci G, Donati C, Cinacchi P, Pazzagli I, Fontana A, Donati S, Salvadori B, Landucci E, Coltelli L, Crucitta S, Del Re M, Scatena C, Zavaglia KM, Morganti R, Bengala

CONFERENCES / COURSES

Participation as a speaker in courses

8 July 2022: "Focus on breast cancer: come cambia la pratica clinica alla luce delle novità presentate al congresso ASCO 2022". Pisa (PI), Italy

25 March 2022: "Inibitori delle ciclina nel carcinoma mammario HR+/HER2-. Tutti uguali o qualcuno più uguale degli altri?", Lido di Camaiore (LU), Italy

17 – 18 July 2025: "Breast Cancer: dalla genetica alla clinica in un concerto di innovazioni", Perugia, Italy

ADDITIONAL INFORMATION

Computer skills

Operating Systems: Windows
Office Applications: Microsoft Office package, Open Office (word processor, spread sheet, presentation softwares)
Data Analysis: basic knowledge of GraphPad Prism, MedCalc and RStudio.

Languages

- Italian: Mother Tongue
- English: Advanced – Certified level C1 (IELTS – British Council)
- Spanish: Intermediate / Advanced – Certified level B2 (Instituto Cervantes – DELE)
- Catalan: Basic (A1 level – not certified)

Milan, 16/03/2026