

Curriculum Vitae

Personal information **Beatrice Chelli**

Work experience

1. Employer: Agenzia Italiana del Farmaco (AIFA)
 - Start date: 102019-present
 - Position: Quality Assessor (Pharmacist) at Biological Medicinal Products Assessment Office
 - Activities: Quality Assessor and Specialist in Regulatory Affairs in the field of Biological Medicinal Products (allergens, plasma_derived products; heparins, vaccines). Evaluation of the quality (module 3) sections of pharmaceutical dossier for new Marketing Authorizations, Variations and Renewals under National, Mutual Recognition and Decentralised procedures. Revision of Product information. Certification of National Plasma Master File (PMF). National procedures for import/export of human plasma and plasma_derived intermediates. Supportive activity for regulatory process and guidelines on allergen products. IT Co_member in CMDh Drafting Group on harmonisation of the regulatory approaches for Allergens. Since March 2022, co_member of AIFA Technical Table on the clinical use of haptens for patch tests.
 - Country: Italy
2. Employer: Agenzia Italiana del Farmaco (AIFA)
 - Start date: 092017
 - End date: 092019
 - Position: Expert
 - Activities: Quality Assessor and Specialist in Regulatory Affairs in the area of Biological Medicinal Products: allergens for immunotherapy and diagnostics. Pharmaceutical_chemical assessment, New Marketing Authorizations (national procedure, MRP/DCP). Supportive activity for national regulatory process and guidelines on allergen products.
 - Country: Italy
3. Employer: Agenzia Italiana del Farmaco (AIFA)
 - Start date: 092015
 - End date: 082017
 - Position: Expert
 - Activities: Quality Assessor and Specialist in Regulatory Affairs in the area of Biological Medicinal Products: Plasma_derived Medicinal Products. Pharmaceutical_chemical assessment; New Marketing Authorizations and Variations under National, Mutual Recognition and Decentralised procedures. Certification of National Plasma Master File. National procedures for import/export of human plasma and plasma_derived intermediates. Supportive activity for national legislation revision for plasma_derived medicinal products.
 - Country: Italy
4. Employer: Secondary High School
 - Start date: 102014
 - End date: 112014
 - Position: Contract Professor
 - Activities: Teaching the course Human Physio_Pathology and Hygiene
 - Country: Italy
5. Employer: Secondary High School
 - Start date: 102013
 - End date: 032014
 - Position: Contract Professor
 - Activities: Teaching the course Chemistry (theory and practical laboratory).
 - Country: Italy
6. Employer: Consiglio Nazionale delle Ricerche (CNR) _ Institute of Nanostructured Materials (ISMN)
 - Start date: 022008
 - End date: 092013
 - Position: Researcher
 - Activities: Research activity in Nano_Bio_technologies applied to Regenerative Medicine and Bioelectronics. Main research interests in neuronal/stem cells differentiation and interfacing on nanostructured materials and electronics devices. Responsible of Cellular Biology Lab. at ISMN_Bologna (Italy). Research and management of scientific activities in various national and collaborative EU projects; writing of grant proposal and scientific papers.
 - Country: Italy
7. Employer: Nano4bio S.r.l.
 - Start date: 062008
 - End date: 072015
 - Position: Co_Founder and Chief Executive Officer
 - Activities: R&D activity for Nano4bio (a start_up operating in nano_biotechnologies applied to Life Sciences). Bussines plan competitions. Responsible of R&D projects and Technology transfer. The company is not operative since 2015.
 - Country: Italy
8. Employer: University of Pisa _ Faculty of Pharmacy.
 - Start date: 112005
 - End date: 112008
 - Position: Assistant Professor
 - Activities: Assistant Professor for the courses in Biochemistry, Molecular Biology and Applied Biology for undergraduate students in Pharmacy, Pharmaceutical Chemistry and Herbal Techniques (teaching, theoretical and practical laboratory exercises, grading exams, supervisor of undergraduate students for experimental dissertations).
 - Country: Italy
9. Employer: University of Pisa _ Department of Psychiatry, Pharmacology, Neurobiology and Biotechnology

- Start date: 022006
 - End date: 012008
 - Position: Research Associated
 - Activities: Research activity in Neurobiology, Biochemistry, Cell Biology and Pharmaceuticals. Main research interests in patho-physiology of anxiety disorders and brain cancer cells: mitochondrial protein role. Research scientist in various national projects and teaching. Training of undergraduate and PhD students.
 - Country: Italy
10. Employer: University of Pisa _ Department of Psychiatry, Pharmacology, Neurobiology and Biotechnology
- Start date: 012003
 - End date: 122005
 - Position: PhD fellow
 - Activities: Research activity in Neurobiology, Biochemistry and Pharmaceuticals. Main research interests in Neurobiology of Psychiatric Disorders and Clinics: mitochondrial protein role in anxiety (adult separation anxiety disorder) and mood disorders, in collaboration with Psychiatry Unit of "Santa Chiara" Hospital, Pisa (Italy). Pharmacological and molecular characterization of mitochondrial protein in different cancer cells and in platelets of patients affected by Amyotrophic Lateral Sclerosis (ALS). Biochemical_clinical parameters correlations. Research scientist in various national projects and collaboration with Psychiatry and Neurology clinical units. Teaching; training of undergraduate students.
 - Country: Italy
11. Employer: University of Pisa _ Department of Psychiatry, Pharmacology, Neurobiology and Biotechnology
- Start date: 011999
 - End date: 112002
 - Position: Postgraduate School Fellow
 - Activities: Research activity in Biochemistry, Cell Biology and Pharmaceuticals. Main research interests in cell survival/death mechanisms in healthy and cancer cells mediated by mitochondrial protein. Receptor binding parameter changes related to mitochondrial disorders. Protein_ligand interaction. Research scientist in various national projects and collaboration with Immunohaematology and Paediatric Oncology clinical units. Teaching; training of undergraduate students.
 - Country: Italy

Education and training

- Subject: University of Rome "La Sapienza"
 - Start date: 122014
 - End date: 122015
 - Qualification: Second level Master in Regulatory Affairs of Medicines
 - Organisation: Regulatory Affairs of Medicines and Investigational Products. Legislative frameworks; Marketing authorization procedures; Evaluation of modules 1_5 of CTD: pre clinical, clinical and quality aspects of different medicines (chemicals, biologics & biotechnologies, herbal medicinal products, radiodrugs and homeopathic, ATMP); Biostatistics and epidemiology; Drug_development; profit/no_profit Clinical trials; Registers; Scientific advice; GLP, GCP, GMP, GVP and relative inspections; Pharmacovigilance (ADR, signal detection; PAESS/PAES, PSUR, RMP, Eudravigilance and national pharmacovigilance network); Pharmaco_economy and Health Technology Assessment. Thesis title: "Evaluation of Clinical Trial by VHP. Voluntary Harmonization Procedure: regulatory and scientific aspects". (02/12/2015).
 - Country: Italy
- Subject: Agenzia Italiana del Farmaco (AIFA)
 - Start date: 042015
 - End date: 072015
 - Qualification: Internship at Clinical Trial Unit
 - Organisation: Training in Quality evaluation of Investigational Medicinal Product Dossier of Biologics. Clinical Trial Application and substantial amendments to clinical protocols and IMP dossier; Voluntary Harmonization Procedure (VHP).
 - Country: Italy
- Subject: Ecole Polytechnique Federale de Lausanne (EPFL)
 - Start date: 022010
 - End date: 022010
 - Qualification: Doctoral Winter School in Biophysics
 - Organisation: Training in studying biomolecules by experiment and theory from a biophysicist's view. (Crans Montana, CH).
 - Country: Switzerland
- Subject: University of Pisa
 - Start date: 012003
 - End date: 122005
 - Qualification: PhD Degree in Neurobiology and Clinic of Affective Disorders
 - Organisation: Department of Psychiatry, Pharmacology, Neurobiology and Biotechnology/ Psychiatric Unit of Santa Chiara Hospital (Pisa). Thesis title: "Adult Separation Anxiety Disorder and Peripheral Benzodiazepine Receptor" (28/03/2006).
 - Country: Italy
- Subject: University of Pisa
 - Start date: 011999
 - End date: 112002
 - Qualification: Diploma in Graduate School in Biochemistry and Clinical Chemistry
 - Organisation: Department of Psychiatry, Pharmacology, Neurobiology and Biotechnology/ Immunohaematology Unit and Paediatric Oncohaematology Unit of Hospitals of Pisa, Italy. Thesis title: "Evaluation of mitochondrial transmembrane potential and apoptosis induction in normal and transformed cells". (13/11/2002).
 - Country: Italy
- Subject: University of Pisa
 - Start date: 101998
 - End date: 111998
 - Qualification: Professional qualification of Pharmacist
 - Organisation:
 - Country: Italy
- Subject: University of Pisa
 - Start date:
 - End date: 111997
 - Qualification: Degree in Chemistry and Pharmaceutical Technologies
 - Organisation: Thesis title: "Peripheral benzodiazepine receptor: effect of noise stress on adrenal and cardiac tissues in rats. (13/11/1997)
 - Country: Italy

Additional information

Publications

1) F. Salvetti, B. Chelli, M. Gesi, A. Pellegrini, G. Giannaccini, A. Lucacchini, C. Martini. Effect of noise exposure on rat cardiac peripheral benzodiazepine receptor. (2000) *Life Sciences* 66: 1165_1175. 2) B. Chelli, A. Falleni, F. Salvetti, V. Gremigni, A. Lucacchini, C. Martini. Peripheral_type benzodiazepine receptor ligands: mitochondrial permeability transition induction in rat cardiac tissue. (2001) *Biochemical Pharmacology*, 61: 695_705. 3) C. Martini, B. Chelli, L. Betti, M. Montali, M. Mancuso, G. Giannaccini, A. Rocchi, L. Murri, G. Siciliano. Peripheral benzodiazepine binding sites in platelets of patients affected by mitochondrial diseases and large scale mitochondrial DNA rearrangements. (2002) *Molecular Medicine*, 8(12): 841_846. 4) M.L. Trincavelli, A. Falleni, B. Chelli, D. Tuscano, B. Costa, V. Gremigni, A. Lucacchini, C. Martini.. A2a adenosine receptor ligands and proinflammatory cytokines induce PC12 cell death through apoptosis. (2003) *Biochem Pharmacol*, 66: 1953_1962. 5) G. Giannaccini, L. Betti, L. Palego, B. Chelli, A. Gallo, A. Pirone, O. Fabiani, S. Bertellotti, A. Lucacchini. In vitro effects of lead ions on peripheral benzodiazepine receptors and adenylyl cyclase activity in the mantle of *Mytilus galloprovincialis*. (2004). *Comp. Biochem. Physiol. Part C*. 137: 197_206. 6) G. Primofiore, F. Da Settimo, S. Taliani, F. Simorini, MP Patrizi, E. Novellino, G. Greco, E. Abignente, B. Costa, B. Chelli, C. Martini. N,N_Dialkyl_2_phenylindol_3_ylglyoxilamides. A new class of potent and selective ligands at the peripheral benzodiazepine receptor. (2004). *J. Med Chem*. 47(7): 1852_1855. 7) B. Chelli, A. Lena, R. Vanacore, E. Da Pozzo, B. Costa, L. Rossi, A. Salvetti, F. Scatena, S. Ceruti, MP Abbraccio, V. Gremigni, C. Martini. Peripheral benzodiazepine receptor ligands: mitochondrial transmembrane potential depolarization and apoptosis induction in rat C6 glioma cells. (2004). *Biochem. Pharmacol*, 68: 125_134. 8) B. Chelli, L. Rossi, E. Da Pozzo, B. Costa, F. Spinetti, M. Rechichi, A. Salvetti, A. Lena, F. Simorini, R. Vanacore, F. Scatena, F. Da Settimo, V. Gremigni and C. Martini. PIGA (N,N-di_n-butyl_5_chloro_2_(4_chlorophenyl)indol_3_ylglyoxylamide), a New Mitochondrial Benzodiazepine Receptor Ligand, Induces Apoptosis in C6 Glioma Cells. (2005). *ChemBioChem*, 6: 1082_1088. 9) S. Pini, C. Martini, M. Abelli, M. Muti, C. Gesi, M. Montali, B. Chelli, A. Lucacchini, G.B. Cassano. Peripheral_Type benzodiazepine receptor binding sites in platelets of patients with panic disorder associated to separation anxiety symptoms. (2005). *Psychopharmacology*, 181: 407_11. 10) B. Costa, A. Salvetti, L. Rossi, F. Spinetti, A. Lena, B. Chelli, MR Rechichi, E. Da Pozzo, V. Gremigni, C. Martini. Peripheral Benzodiazepine Receptor: Characterization in human T_Lymphoma Jurkat cells. (2006). *Mol Pharmacol*. 69: 37_44. 11) S Taliani, F Simorini, V Sergianni, C La Motta, F Da Settimo, B Cosimelli, E Abignente, G Greco, E Novellino, L Rossi, V Gremigni, F Spinetti, B Chelli, Martini C. New fluorescent 2_phenylindolglyoxylamide derivatives as probes targeting the peripheral_type benzodiazepine receptor: design, synthesis, and biological evaluation. (2007). *J Med Chem*. 50: 404_7. 12) M Rechichi, A Salvetti, B Chelli, B Costa, E Da Pozzo, F Spinetti, A Lena, M Evangelista, G Rainaldi, C Martini, V Gremigni, L Rossi. TSPO over_expression increases motility, transmigration and proliferation properties of C6 rat glioma cells. (2008). *Biochim Biophys Acta*, 1782:118_25. 13) B Chelli, S Pini, M Abelli, A Cardini, L Lari, M Muti, C Gesi, G.B Cassano, A Lucacchini, C Martini. Platelets 18 kDa translocator protein density is reduced in depressed patients with adult separation anxiety. (2008) *Eur Neuropsychopharmacology*, 18:249_54. 14) Manetti F, Brullo C, Magnani M, Mosci F, Chelli B, Crespan E, Schenone S, Naldini A, Bruno O, Trincavelli ML, Maga G, Carraro F, Martini C, Bondevalli F, Botta M. Structure_based optimization of pyrazolo[3,4_d]pyrimidines as Abl inhibitors and antiproliferative agents toward human leukemia cell lines. (2008) *J Med Chem*. 51:1252_9. 15) B. Chelli, A. Salvetti, E. Da Pozzo, M. Rechichi, F. Spinetti, L. Rossi, B. Costa, A. Lena, G. Rainaldi, F. Scatena, R. Vanacore, V. Gremigni and C. Martini. PK 11195 Differentially Affects Cell Survival in Human Wild_Type and 18 kDa Translocator Protein_Silenced ADF Astrocytoma Cells. (2008). *J Cell Biochem*, 105:712_23. 16) S. Taliani, F. Da Settimo, E. Da Pozzo, B. Chelli, and C. Martini. Translocator protein ligands as promising therapeutic tools for anxiety disorders. (2009). *Curr Med Chem*, 16 (26): 3359_80. Epub 2009 Sept 1. Review. 17) M. Abelli, B. Chelli, B. Costa, L. Lari, A. Cardini, C. Gesi, M. Muti, A. Lucacchini, C. Martini, G. B. Cassano, S. Pini Reductions in Platelet 18_kDa Translocator Protein Density Are Associated with Adult Separation Anxiety in Patients with Bipolar Disorder. (2010). *Neuropsychobiology*. 62(2):98_103. 18) C. Dionigi, M. Bianchi, P. D'Angelo, B. Chelli, P. Greco, A. Shehu, I. Tonazzini, A. N. Lazar, F. Biscarini. Control of neuronal cell adhesion on single_walled carbon nanotube 3D patterns. (2010) *Journal of Materials Chemistry*, 20, 2213-2218. 19) Tonazzini I, Bystrenova E, Greco P, Stoliar P, Calò A, Lazar A, Chelli B, Martini C, Biscarini F. Multiscale morphology of organic semiconductor thin films controls the adhesion and viability of human neural cells. (2010) *Biophys J*. 98:2804-2812. 20) Valle F, Chelli B, Bianchi M, Greco P, Bystrenova E, Tonazzini I, Biscarini F. Stable non_covalent large area patterning of inert Teflon_AF surface: a new approach to multiscale cell guidance. (2010) *Adv. Engineer. Materials*, 12 (6) B185_91. 21) B. Costa, E. Da Pozzo, B. Chelli, N. Simola, M. Morelli, M. Luisi, M. Maccheroni, S.Taliani, F. Simorini, F. Da Settimo, C. Martini. Anxiolytic properties of a 2_phenylindolglyoxylamide TSPO ligand: Stimulation of in vitro neurosteroid production affecting GABAA receptor activity. (2011) *Psychoneuroendocrinology*, 36, 463_72. 22) A Antosova, B Chelli; E Bystrenova; K Siposova, F Valle, J Imrich; M. Vilkova, P Kristian, F Biscarini; Z Gazova. Structure_activity relationship of acridine derivatives to amyloid aggregation of lysozyme. (2011). *Biochim Biophys Acta*, 1810(4), 465_74. 23) B. Costa, S. Pini, M. Abelli, P. Gabelloni, E. Da Pozzo, B. Chelli, S. Calugi, L. Lari, A. Cardini, A. Lucacchini, G.B Cassano and C. Martini. Role of Translocator Protein (18kDa) in adult separation anxiety and attachment style in patients with depression. (2012). *Curr Mol. Med*. 12(4) 483_7. 24) Biscarini F, Bianchi M, Chelli B, Valle F, Dionigi C, Bystrenova E, Greco P. Unconventional multi_scale patterning of titanium dioxide: a new tool for the investigation of cell_topography interactions (2012) *Adv. Engineer. Mater*. 14(5): B208_215. 25) B. Chelli, T. Cramer, M. Murgia, M. Barbalinardo, E. Bystrenova, Dago M. de Leeuw, and Fabio Biscarini. Organic Ultra_Thin Film Transistor with Liquid Gate for Extracellular Stimulation and Recording of Electric Activity of Stem Cell_Derived Neuronal Networks (2013) *Physical Chemistry Chemical Physics*, 15, 3897. 26) B Chelli, M Barbalinardo, F Valle, P Greco, E Bystrenova, M Bianchi, F Biscarini. Neural Cell Alignment by Patterning Gradients of the Extracellular Matrix Protein Laminin. (2014) *Interface Focus*; 4(1) 20130041, doi: 10.1098/rsfs.2013.0041. 27) I. Tonazzini, E. Bystrenova; B. Chelli; P. Greco; D. De Leeuw; F Biscarini. Human Neuronal SHSY5Y Cells on PVDF:PTFE Copolymer Thin Films (2014) *Advanced Engineering Materials* DOI:10.1002/adem.201400441. Book articles 1) B. Chelli, E. Da Pozzo, L. Rossi, F. Simorini, A. Salvetti, S. Taliani, V. Gremigni, F. Da Settimo and C. Martini. (2009). Cell survival/death processes: Role of the mitochondrial Translocator Protein (TSPO) ligands. In: "New Perspectives in Medicinal Chemistry", Vol.1, 79_91. Alcaro S. Ed. Transworld Research Network. ISBN: 978_81_308_0321_0; 2) M. Bellandi, S. Taliani, I. Pugliesi, O. Awwad, F. Simorini, C. La Motta, S. Salerno, A.M. Marini, F. Da Settimo, B. Cosimelli, G. Greco, E. Novellino, L. Rossi, V. Gremigni, E. Da Pozzo, B. Chelli and C. Martini. (2009). Design, synthesis, and biological evaluation of novel fluorescent probes targeting the Translocator Protein (18 kDa) (TSPO). In: "New Perspectives in Medicinal Chemistry", Vol.1, 79_213. Alcaro S. Ed. Transworld Research Network. ISBN: 978_81_308_0321_0. Author or co_author of more than 80 Conference proceedings (here reported only selected published in international journals): 1) B Chelli, M Mancuso, L Betti, G Giannaccini, C Martini, G Siciliano. Peripheral benzodiazepine binding sites in platelets of patients affected by mitochondrial diseases. Congress of Mitochondrial Myopathy, Venezia 19_22 Sept 2001. In : Mitochondrion (2001) Vol 1 Suppl.1 S37 (ISSN 1567_7249). 2) B Chelli, S Piazza, M Franzini, A Rocchi, C Martini, A Del Corona, A Paolicchi, A Pompella, G Siciliano. Nitroxidation markers and mitochondrial peripheral benzodiazepine receptor in amyotrophic lateral sclerosis. XXXV National Congress of Italian Society of Neurology, Genova 25_29, Sept 2004. In: Neurological Sciences 2004, vol 25, S.107. (ISSN 1590_1874). 3) B Chelli, S Piazza, M Franzini, A Rocchi, C Martini, A Del Corona, A Paolicchi, A Pompella, G. Siciliano. Nitroxidation markers in CSF and mitochondrial peripheral benzodiazepine receptor in amyotrophic lateral sclerosis. 15th International Symposium on ALS/MND_Philadelphia_USA_2_4 Dec 2004. In: Amyotrophic Lateral Sclerosis and other Motor Neuron Disorders (2004) Vol 5_Suppl 2_p.66 (ISSN 1466_0822). 4) Pini S, Martini C, Abelli M, Montali M, Chelli B, Muti M, Preve M, Lucacchini A. Peripheral_type benzodiazepine receptor binding sites in platelets of patients with panic disorder associated to separation anxiety symptoms. 8th Regional Meeting of the European Congress of Neuropathology. Moscow, RUSSIA, 14_16 Apr, 2005. In: Eur. Neuropsychopharmacol. 2005, vol 15, S.2 p. S171 (ISSN 0924_977X).

Projects

Research scientist in several national and EU collaborative projects, e.g.: FP6_NMP_3_CT_2006_033355 "Switch_able materials and their fabrication technology for Multifunctional TAG" (S_TAG). FP6_NMP_CT_2006_032652 "Sensing BIOSystems and their Dynamics in fluids with Organic Transistors" (BIODOT). FP7_NMP_2007_212311 "Organic Nanomaterials for Electronics and Photonics" (ONE_P). FP7_NMP_2011_280772_2 "Implantable Organic Nano_Electronics" (I_ONE).

Memberships

Other Relevant Information

Visiting Scientist at Clinical Neurosciences, Cambridge Centre for Brain Repair and Cambridge Stem Cell Initiative. University of Cambridge, UK (July 2012). National and international Awards for the business idea of

Nano4bio_Business Plan competitions. Reviewer of international journals (i.e. Biochemical Pharmacology; European Journal of Pharmacology; FEBS Journal; Journal of Pharmacology and Experimental Therapeutics; Journal of Translational Medicine; Journal of Applied Physics; Advanced Biomaterials).