

Luigi Panza

PERSONAL DATA

Born in Como, 5.11.1958
Residente a Fino Mornasco (CO)

BIO AND EDUCATION

1983 Graduated in Chemistry, (Diploma di Laurea in Chimica), Milano University, Dept. of Organic and Industrial Chemistry, with the thesis "Stereospecific synthesis of phosphono analogs of 2-Z-isoprenyl phosphates".

1985-1986 Fellow of Accademia Nazionale dei Lincei working on the development of new glycosylation methods.

1986-1988 PhD in Chemistry (Dottorato di Ricerca in Scienze Chimiche), Milano University, Dept. of Organic and Industrial Chemistry, with the thesis "Stereoselective synthesis of carbohydrates of biological relevance".

1988-1990 Post-Doc at the Zurich University under the supervision of Prof. Andrea Vasella working on the synthesis and reactivity of glycosylidene diazirines.

UNIVERSITY CAREER

2015-	Associate Professor, Università del Piemonte Orientale
2002-2014	Researcher, Università di Milano
1998-2002	Post-Doc, Università di Zurigo (CH)
1994-1996	Fellow, Accademia Nazionale dei Lincei

UNIVERSITY POSITIONS

2014-	Coordinator, PhD Program in Chemistry&Biology, Università del Piemonte Orientale
2006-2012	Member elected to the Board of Directors, Università del Piemonte Orientale
2008-2001	Coordinator, PhD Program in Sciences of Bioactive Compounds, Università del Piemonte Orientale

SCIENTIFIC POSITIONS

2014-	Topic Editor, Reference Module in Chemistry, Molecular Sciences and Chemical Engineering - Elsevier
2008-	Member of the Board of Councilors, International Society for Neutron Capture Therapy

MAIN FIELDS OF INTEREST

1. Organic Synthesis
2. Carbohydrates and glycoconjugates
3. Immunomodulators
4. BNCT
5. Boronated sugars

CURRENT ISSUES OF RESEARCH

1. Synthesis of oligosaccharides of biological relevance

Synthesis of immunogenic glycolipids presented by "antigen presenting molecules" Adjuvants for immunization. CD1. New methods of glycosidation. Use of enzymes in carbohydrate chemistry. Synthesis of sugar analogs.

2. Boronates sugars for cancer treatment with in neutron capture therapy

Synthesis of analogs of sugars containing boron atoms able to give accumulation in tumor cells exploiting different strategies including the use of nanotechnology.

CURRENT FUNDED PROJECTS

PROGRAMME	FUNDED PROJECT
Bando San Paolo 2014	GLYCOBNCT - (CUP: C61J12000280007) – “New boronated sugars and their incorporation in functionol nonocorriers for a breakthrough in neutron copture therapy” http://www.uniupo.it/it/ricerca/i-progetti-finanziati/finanziamenti-delle-fondazioni/compagnia-di-san-paolo

TOP FIVE PAPERS

1. Synthesis of Carboranyl Derivatives of Alkynyl Glycosides as Potential BNCT Agents. Giovenzana G. B., Lay L., Monti D., Palmisano G., Panza L. *Tetrahedron*, **1999**, *55*, 14123-36.
2. Synthesis of sulfated galactocerebrosides from an orthogonal β -D-galactosylceramide scaffold for the study of CD1-antigen interactions. Compostella F., Ronchi S., Panza L., Mariotti S., Mori L., De Libero G., Ronchetti F., *Chem. Eur. J.* **2006**, *12*, 5587-5595.
3. Dehydrative glycosylation with the Hendrickson reagent. Mossotti M., Panza L. *J. Org. Chem.* **2011**, *76*, 9122-9126.

4. Rational design of gold nanoparticles functionalized with carboranes for application in Boron Neutron Capture Therapy. Ciani L.; Bortolussi, S.; Postuma I.; Cansolino L.; Ferrari C.; Panza L.; Altieri Ristori S.; *Int. J. Pharm.* **2013**, *458*, 340-346.
5. Protected Sphingosine from Phytosphingosine as an Efficient Acceptor in Glycosylation Reaction Di Benedetto R., Zanetti L., Varese M., Rajabi M., Di Brisco R., Panza L. *Org. Lett.* **2014**, *16*, 952-955