Prof. Paolo Quadrelli graduated in Chemistry at the University of Pavia on March the 18th, 1986 with *110/110 cum laude* with an experimental thesis entitled "Reactions of cupric complexes of isatin derivatives with dimethyl acetilenedicarboxylate" (Supervisor: Prof. G. Desimoni).

PhD Degree - In the next three years, Dr. Quadrelli conducted his researches during the PhD in Chemical Sciences at the University of Pavia, achieving the final degree in September 1990 with a thesis entitled "Copper(II) complexes and their applications in organic synthesis" (Supervisor: Prof. G. Desimoni).

Industrial Job Experience - From November 1989 to June 1992 Dr. Quadrelli worked in R&D Laboratories of the Eniricerche SpA Company (ENI Group), San Donato Milanese (MI) operating in the field of heterogeneous catalysis and developing a superacidic original catalyst for the reactions isomerization of n-alkanes and alkylation. He is author of a Patent, *EP 0520543 – 1992*, dealing with the preparation of novel solid superacid catalysts.

Academic Career - Dr. Quadrelli joined on November 16th, 1992 the Department of Organic Chemistry, Faculty of Sciences, University of Pavia, as Researcher in Organic Chemistry. From November 1996 to October 1997 Dr. Quadrelli was *Marie Curie Fellow* at the School of Chemistry, University of Leeds (Great Britain) in the research group of Prof. Ronald Grigg. During this period, the research focused on the themes of the Palladium as a catalyst for chemical cascade and 1,3-dipolar cycloadditions of azomethine ylides, conducted both in solution and on solid phase (http://cordis.europa.eu/tmr/src/grants/fmbi/961350.htm).
After these experiences, Prof. Quadrelli continued his work as a Researcher in the group of Prof. P. Caramella at the Department of Organic Chemistry of the University of Pavia, pursuing researches in the field of pericyclic reactions and particularly conducting studies on the 1,3-dipolar cycloaddition reactions of heteroaromatic systems, chemistry of 1,3-dipoles and their applications in the synthesis of biologically active derivatives (nucleosides) and in 1,3-dipolar cycloadditions (with and without catalysts) conducted in solid phase. Recently, he was also involved in industrial collaborations and in the synthesis of steroids and derivatives.
He was appointed Associate Professor on May 2010.
He got the habilitation to Full Professor in 2017.

1. Teaching
The teaching duties of Prof. Paolo Quadrelli are entirely hosted by the Department of Chemistry (Organic Chemistry Section) of the University of Pavia in the fields related to the Organic Chemistry. In particular:
Courses
a) from 1997 to 1998, Laboratory of Organic Chemistry II. This course emphasizes the experimental aspects of Organic Chemistry and provides for the realization of synthesis of simple organic compounds.
b) from 1998 to 1999, Laboratory of Organic Chemistry for the Master Degree in Chemistry. This course is based on the realization of simple organic synthesis under the theoretical knowledge, by introducing and implementing the major spectroscopic techniques.
c) from 1999 to 2003, Fundamentals of Organic Chemistry. This course focuses on teaching the main synthetic methods and reactivity of aliphatic and aromatic compounds, and the different classes of monofunctional compounds.
d) from 2003 to 2007, Applied Organic Chemistry. The chemistry of enolates, amino acids, pericyclic reactions, oxidations and reductions of major functional groups and their protection are the topics covered in this course, completed by a laboratory with practical exercises.
e) from 2002 to 2006, Safety Course in Chemical Laboratory.
f) from 2007 to 2014, Organic Chemistry Laboratory for students attending the Chemistry degree.
g) from 2010 to 2011, Bioorganic Chemistry for the students attending the Biotecnology degree.

h) from 2011 to present Prof. Quadrelli holds the course of Organic Chemistry for the students attending the Degree of Natural Sciences.
i) from 2016 Prof. Quadrelli holds the course of Heterocyclic Chemistry for the Chemistry Master degree students.
j) from 2024 Prof. Quadrelli holds the course of Organic Chemistry 2 for the Chemistry and Pharmaceutical Technologies students.

2. Scientific activities.
The scientific work of Prof. Paolo Quadrelli is documented by more than 100 papers and 36 communications to national and international scientific meetings. The researches can be summarized into the following main topics:
a) use of transition metal catalysts in stereoselective organic synthesis;
b) 1,3-dipolar cycloadditions and synthetic applications on heteroaromatic systems
c) chemistry of 1,3-dipoles and their transformation into reactive species for heterocyclic synthesis;
d) synthesis of antiviral compounds and drug delivery systems;
e) solid phase organic synthesis;
f) synthesis of steroids.

Present and Future Research.
The research activity guided by Prof. Paolo Quadrelli continues in all these fields. In particular:
• Nitrosocarbonyl reactivity:
i) Ene reactions of nitrosocarbonyls with allylic alcohols for the synthesis of new N,O-nucleosides;
ii) Carbocyclic nucleoside syntheses – anti-viral tests;
iii) Enantiopure nucleoside synthesis through chiral nitrosocarbonyls;
iv) Theoretical studies on pericyclic reaction mechanisms;
v) Synthesis of peptidomimetic amino acids.
vi) Synthesis of γ-lactams from azanorbornene derivatives.
vii) Docking studies for nucleoside design.
• Solid phase synthesis:
i) Cycloaddition reactions on soluble polymers;
ii) Environmental approach to nitrosocarbonyls;
iii) Nitrone reactivity of 1,2,4-oxadiazole-4-oxides.
• Transition Metals catalyzed synthesis:
i) Pd(0)-catalyzed approaches to nucleoside analogues;
ii) RuO_4-promoted oxidations of active methylenes.
iii) Peptidomimetic amino acids.
iv) γ-Lactams.
v) Synthesis of β-turn inducers and peptidomimetics.

3. – Funding and Collaborations with Industries.
The reasearch activities riceve currently the financial support by the following institutions:
i) University of Pavia (Fondo d'Ateneo per la Ricerca, FAR);
ii) Italian Ministry of Education (National Research Project PRIN 2005, 2008, 2011 and 2015);
iii) Bank Foundation, Fondazione Banca del Monte di Lombardia;
iv) AMRI-Euticals S.p.A., Chemical Company in Rozzano (MI), Italy;
v) Steroid S.p.A., Chemical Company in Cologno M.se (MI), Italy.
vi) BASF S.p.A., Chemical Company in Mortara (PV), Italy.
vii) Teofarma S.r.l., Chemical Company in Pavia, Italy.

4. Reviewer activity
Prof. Paolo Quadrelli provided service as reviewer to the Editors and Authors of the following journals: Eur. J. Org. Chem.; Chem. Eur. J.; Angew. Chem. Int. Ed. from Wiley-VCH; J. Org.

Chem.; Org. Lett.; Chem. Rev. from ACS; Tetrahedron; Tetrahedron Lett. from Elsevier; Chem. Commun. from RSC. Member of the Editorial Board of Molecules.

5. Administrative and organizative activities.

From January 1997 to January 2002, Prof. Paolo Quadrelli was Safety Officer in the Department of Organic Chemistry. Since 1992 he has always dealt with the security issues in the Department giving lectures on Safety within the laboratory courses for the student attending the Chemistry degree. Officially, since 1997 has performed the duties of Safety Officer as required by law. This role has been trained specifically in relation to the position of Fire Chief's Emergency Department Team and held training sessions on Risk for Chemical Workers in the University.

On 1999 he was elected Representative of Teachers for the topics of Security at the University of Pavia and re-elected on November 2002. That experience earned him the cover for replacement of the Chemical Laboratory Safety Course for High Schools' Teachers from 2002 to 2006.

He was member of the University Student Fund Commission.

From 2005 to 2007 was Head of Scientific Research Unit of Pavia in the PRIN 2005 funded by MIUR. He was in charge again in 2008 and from 2011 to 2016 of the same Research Unit.

Prof. Quadrelli organized the XIII National Conference of Pericyclic Reactions in Pavia, 2009 and the XXXIV National Conference on Organic Chemistry of the Italian Chemical Society in Pavia, 2012.

Since 2011 to 2014, Prof. Quadrelli was vice-Director of the Department of Chemistry. He is head of the Organic Chemistry Section of the Department of Chemistry since 2015.

Prof. Quadrelli was in charge for the LM+ degree in Chemistry in collaboration with chemical companies of Lombardy from 2018 to 2021.

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