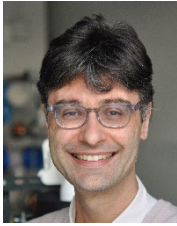


PERSONAL INFORMATION

Luigi Pietro Maria Colombo



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📄 

Sex Male | *Date of birth* 23/11/1973 | *Nationality* Italian

WORK EXPERIENCE

from March 2021 - to present

Full professor of Thermal Sciences

Politecnico di Milano – Department of Energy

- Teaching: Engineering Thermodynamics, Multiphase Systems and Technologies
- Scientific Research: multiphase flow in pipes, condensation and evaporation of refrigerants, energy systems thermodynamic analysis
- Head of the BSc and MSc programmes in Energy Engineering

from Dec 2014 - to Feb 2021

Associate professor of Thermal Sciences

Politecnico di Milano – Department of Energy

- Teaching: Engineering Thermodynamics, Heat and Mass transfer, Multiphase Systems and Technologies
- Scientific Research: multiphase flow in pipes, condensation and evaporation of refrigerants, enhancement of forced convection, energy systems thermodynamic analysis
- Head of the BSc and MSc programmes in Energy Engineering (since 2019)

from May 2005 - to Nov 2014

Assistant professor of Thermal Sciences

Politecnico di Milano – Department of Energy

- Teaching: Engineering Thermodynamics, Heat transfer
- Scientific Research: enhancement of forced convection, natural convection, optical techniques in transparent fluid flows: holographic interferometry, digital speckle photography, multiphase flow and heat transfer

EDUCATION AND TRAINING

from Jan 2002 – to March 2004

PhD degree cum laude in Energetics

EQF Level 8

Politecnico di Milano, Milan, Italy

- Application of Optical Methods to the Study of Forced Convection Heat Transfer

from Nov 1992 – to Dec 1999

MSc in Electronics Engineering – sub-topic Bioengineering

EQF Level 7

Politecnico di Milano, Milan, Italy

- Beat-to-beat Relationships among Heart Frequency, Breathing and Ventricular Volume through ECG Techniques

PERSONAL SKILLS

Mother tongue(s)	Italian
Other language(s)	English: C1 French: C1 German: A2 Spanish: A2
Job-related skills	Expert in thermal and flow measurements and instrumentation
Digital skills	Matlab, Comsol Multiphysics, Fluent

ADDITIONAL INFORMATION

- Publications
- Molinaroli, L; Lucchini, A; Colombo, L P M, **Drop-in analysis of R450A and R513A as low-GWP alternatives to R134a in a water-to-water heat pump** (2022) International Journal of Refrigeration, 135, pp. 139-147, <https://doi.org/10.1016/j.jirefrig.2021.12.007>
- De Antonellis, S, Colombo, L, Freni, A, Joppolo, C, **Feasibility study of a desiccant packed bed system for air humidification** (2021) Energy, 214, pp. 1-13, <https://doi.org/10.1016/j.energy.2020.119002>
- Colombo, L P M, Lucchini, A, Molinaroli, L, **Experimental analysis of the use of R1234yf and R1234ze(E) as drop-in alternatives of R134a in a water-to-water heat pump** (2020) International Journal of Refrigeration, 115, pp. 18-27, <https://10.1016/j.jirefrig.2020.03.004>
- Babakhani Dehkordi, P, Colombo, L P M, Mohammadian, E, Shahrabadi, A, Azdarpour, A, **A mechanistic model to predict pressure drop and holdup pertinent to horizontal gas-liquid-liquid intermittent flow** (2019) Chemical Engineering Research and Design, 149, pp. 182-194, <https://10.1016/j.cherd.2019.07.009>
- Pini, A, Cammi, A, Colombo, L, Tigliole, A B, **A non-equilibrium control oriented model for the pressurizer dynamics** (2018) Progress in Nuclear Energy, 106, pp. 102-119, <https://10.1016/j.pnucene.2018.02.017>
- Lombardi, F, Colombo, L, Colombo, E, **Design and validation of a Cooking Stoves Thermal Performance Simulator (Cook-STePS) to simulate water heating procedures in selected conditions** (2017) Energy, 141, pp. 1384-1392, <https://10.1016/j.energy.2017.11.045>
- Manzolini, G, Colombo, L P M, Romare, S, Fustinoni, D, **Tiles as solar air heater to support a heat pump for residential air conditioning** (2016) Applied Thermal Engineering, 102, pp. 1412-1421, <https://10.1016/j.applthermaleng.2016.03.009>
- Armanasco, F, Colombo, L P M, Lucchini, A, Rossetti, A, **Performance analysis of a solar cooling plant based on a liquid desiccant evaporative cooler** (2015) International Journal of Refrigeration, 53, pp. 163-176, <https://10.1016/j.jirefrig.2015.01.008>
- Colombo, L, Dolara, A, Guzzetti, S, Lazaroiu, G C, Leva, S, Lucchini, A, **Thermal and luminous investigations of a pLED based refrigerating liquid prototype** (2014) Applied Thermal Engineering, 70 (1), pp. 884-891, <https://10.1016/j.applthermaleng.2014.06.008>
- Valenti, G, Colombo, L, Murgia, S, Lucchini, A, Sampietro, A, Capoferri, A, Araneo, L, **Thermal effect of lubricating oil in positive-displacement air compressors** (2013) Applied Thermal Engineering, 51 (1-2), pp. 1055-1066, <https://10.1016/j.applthermaleng.2012.10.040>
- Armanasco, F, Colombo, L P M, Lucchini, A, Rossetti, A, **Techno-economic evaluation of commercial cogeneration plants for small and medium size companies in the Italian industrial and service sector** (2012) Applied Thermal Engineering, 48, pp. 402-413, <https://10.1016/j.applthermaleng.2012.04.04>