

# Luigi Casagrande

Materials and Nanotechnology Engineer

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## Education

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<b>MS</b>	POLITECNICO DI MILANO, <b>Materials Engineering and Nanotechnology</b> (english)	Sep 2023 - Mar 2026 Milano, Italy 
	<ul style="list-style-type: none"> <li>Specialization in: <i>Engineering Applications</i></li> <li>Relevant coursework: “Metallic Materials and Product Innovation”, “Composite Materials”, “Life Cycle Assessment”, “Materials for Energy”</li> </ul>	
<b>EX</b>	SHANGHAI JIAO TONG UNIVERSITY, <b>Materials Engineering</b>	Sep 2024 - Feb 2025 Shanghai, China 
	<ul style="list-style-type: none"> <li><i>World Wide Exchange Program</i> offered by Politecnico di Milano</li> <li>Relevant coursework: “Multiscale Materials Modelling”, “Advanced Bio-Functional Materials”, “Smart Polymeric Materials”</li> </ul>	
<b>BS</b>	POLITECNICO DI MILANO, <b>Materials Engineering and Nanotechnology</b> (italian)	Sep 2020 - Jul 2023 Milano, Italy 
	<ul style="list-style-type: none"> <li><b>Thesis:</b> “Production of Printed Devices for Energy Storage”</li> <li>Relevant coursework: “Steelmaking”, “CAD Modelling”, “Data Analysis and Experimental Methods”, “Structural Mechanics”</li> </ul>	
<b>EX</b>	KAWANA WATERS HIGH SCHOOL, <b>STEM subjects</b>	Jul 2016 - Sep 2016 Queensland, Australia 
	<ul style="list-style-type: none"> <li>Independent study term abroad during High School</li> </ul>	

## Skills

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**Languages:** • Italian (*native*) • English (*fluent*) • Chinese (*elementary*) • French (*elementary*)

**Professional Software:** MATLAB, Autodesk Inventor, SolidWorks, Abaqus, LAMMPS, OpenLCA, Comsol, JMP Pro

**Enterprise & Business Software:** Microsoft Office, Power BI

**Programming Languages:** Python, L<sup>A</sup>T<sub>E</sub>X, JavaScript, C++, HTML/CSS

## Certificates

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➤ <b>IELTS Academic</b> ↵	issued by: <i>British Council</i>	2023
English language certification, C1 Level (7.5).		
➤ <b>International Pool Lifeguard</b> ↵	issued by: <i>Federazione Italiana Nuoto</i>	2017
Lifeguard certification at indoor/outdoor swimming pools.		
➤ <b>Pre-Academic Piano Certificates</b> ↵	issued by: <i>Conservatori di Musica italiani</i>	2013 & 2016
Certification exams in piano for admission to the music conservatory, I and II cicle.		
➤ <b>Marine Military Sailing Course</b> ↵	issued by: <i>Federazione Italiana Vela</i>	2015
Certification of passing the sailing course exam of the Italian Navy.		

## About Me

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- Since childhood, I have pursued **competitive swimming** at a national level, alongside an active engagement in **music** through solo and ensemble performances. These sustained disciplines have shaped a highly determined, resilient, and **results-driven approach**.
- I have always **challenged myself** by participating in mathematics, computer science, and chemistry competitions, and was awarded the ‘Aurea’ Cup in the high school team championship. These experiences enhanced my **teamwork abilities**, **critical thinking**, and **problem-solving** skills.
- Travelling and engaging with different cultures have enhanced my **adaptability** and **open-minded approach** to diverse environments, contributing to my full proficiency in **English** and my ongoing study of the **Chinese** language.