Desiree **MANICARDI**

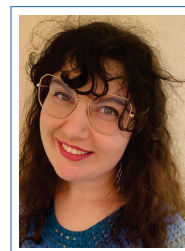*PhD in "Computer Science and Computational Mathematics"*

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Varese, Italy
Year of Birth: 1994
Updated on 2025/09/24

Computer Skills

Strenghts

Database	**SQL**	*During my university studies, I did two projects and the Bachelor thesis using SQL.*
	NoSQL	*During my university studies, I did two projects using NoSQL.*
Programming	**Java**	*I have been studying this language since 2013. During my university studies, I did six projects using Java. I tutored this language at the University of Insubria during the A.Y. 2020-2021 and 2021-2022.*
	Python	*I have been using Python for my research since 2020. During the A.Y. 2020-2021, I served as an adjunct professor of this language at the University of Turin.*
	Object-Oriented Programming	

Good – Intermediate

Backend	Node.js
Command-line Tools	Terminal
	PowerShell
	CMD
Database	MySQL, MongoDB, PostgreSQL
	Normalization
Diagrams	UML, ER
E-mail	E-mail and Italian Certified e-mail (PEC, Posta Elettronica Certificata)
Environment	Eclipse
Markup	LaTeX
Office	Office suite (Microsoft Office and Open Office)
OS	Windows
Programming	C, C++, C#
	Parallel, distributed and concurrent programming
Security	Antivirus System
	Authentication
Tools	pgAdmin, Node-RED

Version Control Systems	GitHub	
Web	HTML, CSS, JavaScript, JQuery	*I'm managing a personal website since December 2023.*
	PHP	
	JSON	
	AJAX	
	Angular	
	Single-page applications, static applications	
	WordPress	*From January 2013 to February 2021, I managed a blog where I put motivational quotes.*

Knowledge

Code Testing	*I studied code testing principles during the Master's. Although I did a project considering testing, I have not already worked with a specific code testing framework, such as Jest.*	
Database	Hippocratic Databases	
Diagrams	Kaos, Problem Frames	
Environment	AndroidStudio	*I developed three Android apps for the Mobile Programming course during my Bachelor's degree.*
	ArduinoUNO	
	Weka	
	Unity	
Model	Client-Server	
Network management	Putty	*I used it for my Bachelor thesis*
OS	Linux	
	MacOS	
	Mobile – Android	
Programming	R	
	Real-time programming	
	API REST	*I used Twitter API for my Bachelor thesis*
	Bash	
	VisualBasic	
	Pascal	
	ArduinoUNO's programming language	
	Assembly	
	VisualBasic, Pascal, ArduinoUNO's programming language, Assembly	
Security	OAuth	*I used it for my Bachelor thesis*
	RBAC (Roll-Based Access Control)	

Web	ASP	*I studied it in the High School.*
Software	Gephi	
Version Control Systems	Git	

Certifications

Computer Science	**Google digital training** - **Fondamenti di marketing digitale**, *Google*, 06/2020
	Técnicas Cuantitativas y Cualitativas para la Investigación, *EdX, Universidad Politécnica de Valencia*, 01/2019
	Data Access in C# and .NET Core, *EdX, Microsoft*, 09/2018
	Asynchronous Programming with Javascript, *EdX, Microsoft*, 08/2018
	Introduction to Python: Absolute Beginner, *EdX, Microsoft*, 08/2018
	Architetture orientate ai servizi, *University of Insubria*, 06/2018
	Sistemi organizzativi a rete, *University of Insubria*, 06/2018
Mathematics	**IGCSE Mathematics Extended**, *University of Cambridge*, 06/2013
	IGCSE Mathematics Core, *University of Cambridge*, 06/2012

Specific Computer Science Training Activities and Courses

1. July 2017: "Agile Software Development", provided by Institute University of Minnesota, edX;
2. July 2017: "Queuing Theory: from Markov Chains to Multy-Server Systems", provided by Institute Mines-Télécom, edX;
3. August 2018: "Using Python for Research", University of Harvard, edX;
4. August 2018: "Computing in Python II: Control Structures", The Georgia Institute of Technology, edX;
5. August 2018: "Computing in Python IV: Objects & Algorithms", The Georgia Institute of Technology, edX;
6. 28th February 2019: "Digital Wellbeing", provided by Google Digital Training;
7. 16th November 2020: "NeuroSpine", V International Meeting, Regeneration & Rehabilitation in Brain and Spinal Cord Injuries, provided by IITM (International Institute of Tele-Medicine);
8. 17th November 2020: "NeuroInformatica", IX Workshop Nazionale, Intelligenza Artificiale, NeuroRobotica, BCI, Teleneurologia, provided by IITM (International Institute of Tele-Medicine);
9. 25th November 2020: "Apprendere con i robot" provided by ComoNExT – Innovation Hub and Agenzia per lo Sviluppo del Canavese;
10. 10th December 2020: webinar "Product accelerator per l'innovazione", provided by ComoNExT – Innovation Hub and ST Microelectronics;
11. 14th December 2020: "Diversity & Cybersecurity: Woman Entrepreneurship Webinar" provided by Concordia;
12. 25th January 2021: "A look inside the black box of scientific publishing" provided by Dr. Matteo Cavalleri;

13. 28th January 2021: "Machine learning in Physics. A general overview" provided by Dr. Marco Landoni, INAF, University of Insubria;

14. 4th February –12th March 2021: "Bioinformatics" provided by Prof. Gianluca Molla, University of Insubria;

15. 17th February 2021: "Realtà virtuale/aumentata e intelligenza artificiale in medicina" provided by Prof. Gabriella Balestra and Dr. Pietro Piazzolla, Politecnico di Torino, Dipartimento di Oncologia, University of Turin;

16. 19th February 2021: "AI: Economics, Law and Ethics – An interdisciplinary approach", provided by University of Insubria;

17. 25th March 2021: "Toward a Composional Verification of Data-Aware Processes via Cospan-Span(Graph)" provided by Alessandro Gianola, Free University of Bozen-Bolzano;

  * 1st April – 3rd June 2021: "Percorsi Cybersecurity" provided by CO.NE.PRO and Ordine dei Dottori Commercialisti e degli Esperti Contabili di Perugia;

   12. 1st April 2021: "Fondamenti di Cybersecurity";

   13. 15th April 2021: "Tecnologie digitali e sicurezza cibernetica";

   14. 30th April 2021: "Tecniche crittografiche per la protezione dei dati";

   15. 6th May 2021: "Tecniche crittografiche per la protezione dei dati";

   16. 20th May 2021: "Nuove sfide per la sicurezza informatica";

   17. 3rd June 2021: "Nuove sfide per la sicurezza informatica";

18. 5th May 2021: Riccardo La Grassa's seminar: "Classical clustering approaches in the context of deep learning";

19. 1st July 2021: "Diversity & Cybersecurity: Women in Cybersecurity Research" provided by Concordia;

20. 15th July 2021: Loan Nguyen Thanh's seminar: "User Data Analysis: Technique Overview";

21. 16th September 2021 – 25th March 2022: "Deep Learning for Pure and Applied Science" (16h), provided by Prof. Giuseppe Carleo and Dr. Filippo Vicentini, University of Lausanne, organised by Prof. Giuliano Benenti, University of Insubria;

22. 3rd February 2022: "La tutela di software, prodotti e servizi nell'industria ICT", provided by Camera di Commercio di Varese;

23. 11th March 2022: "The Curious Case of Explosive Seed Dispersal: How Nature "Exploits" Mechanics to Increase its Survival Chances", provided by Dr. Gabriella Mosca (Max Planck Institute for Plant Breeding Research);

24. 26th – 29th May 2022: "Technologies for Processing Streaming Data Pipeline" (16h), provided by Dr. Gianfranco Modoni, Consiglio Nazionale delle Ricerche;

25. 12th – 22nd December 2022: "Directed Networks", provided by Prof. J.J.P. Veerman, organized by Prof. Giorgio Mantica;

26. 21st December 2022: "Understanding Epidemics via the Theory of Dynamical System", Prof. Giorgio Mantica, University of Insubria;

27. 25th January 2023: "Il gioco è una cosa seria: potenzialità dei videogiochi nella ricerca, per il benessere, la diagnosi e la terapia di disordini psicologici ed il loro ruolo in contesti di isolamento sociale.", provided by Arianna Boldi, University of Turin;

28. 1st March – 5th April 2023: "Computational Cognitive Modeling", provided by Dr. Silvia Elena Corchs, University of Insubria;

29. 12th April 2023: "Exemplar usable security and human factors techniques and their application to research case studies in heterogenous industries", provided by Dr. Huseyin Dogan, Bournemouth University (situated at University of Insubria);

30. 9th – 16th June 2023: "Systems, modelling & Simulations", provided by Prof. Habib Sedehi (situated at University of Insubria);
31. 13th – 15th September 2023: 24th Italian Conference on Theoretical Computer Science 2023 (Palermo, Italy)
32. 15th November 2023: "Fidarsi o non fidarsi della IA generativa che parla il linguaggio degli umani?" provided by Prof. Carlo Batini, University of Milan-Bicocca;
33. 24th February 2025: "Neuro-Symbolic Artificial Intelligence" provided by Dr. Luciano Serafini, Fondazione Bruno Kessler (situated at University of Insubria).

APRE / For Research / Other

1. 9th November 2020: "Junior Researchers Session", about using software *Research Professional, provided by University of Insubria;
2. 26th November 2020: "IP Management in ICT Project" provided by IPR Helpdesk;
3. 3rd December 2020: "IP Management in Biotechnology" provided by IPR Helpdesk;
4. 17th December 2020: "Verso i nuovi bandi individuali delle MSCA in Horizon Europe: Postdoctoral Fellowship" provided by APRE (Agenzia per la Promozione della Ricerca Europea);
5. 11th – 12th January 2021: "Percorso formativo verso Horizon Europe: scenario e prospettive del nuovo programma europeo per la ricerca e l'innovazione" provided by APRE;
6. 20th January 2021, "La comunicazione dei risultati della ricerca", provided by Prof. Giuseppe Tipaldo, University of Turin;
7. 21st January 2021: "Introduction to IP" provided by European IP Helpdesk;
8. 23rd March 2021: "Marie Skłodowska-Curie Actions under Horizon Europe Information Event", provided by European Commission;
9. 24th March 2021: "How to prepare a successful proposal in Horizon Europe", provided by European Commission;
10. 18th November 2021: "I finanziamenti dello European Research Council (ERC) in Horizon Europe", provided by Marco Ferraro (APRE, National Contact Point di Horizon);
11. 26th November 2021: "Storie di Innovazione: come dalla ricerca nasce l'innovazione. . . la parola ai ricercatori";
12. 18th February 2022: "Storie di Innovazione: come dalla ricerca nasce l'innovazione. . . la parola ai ricercatori";
13. 8th March 2022: "Diversity & Cybersecurity: Women in Cybersecurity Industry", provided by Concordia H2020;
14. 16th March 2022: "JoVE @ Uninsubria", provided by Alice Pistono, University of Insubria;
15. 18th March 2022: "Incontro helpdesk IRInSubria", provided by Scuola di Dottorato, University of Insubria;
16. 31st March 2022: "OECD iLibrary Training for Università degli Studi dell'Insubria", provided by James Kitchen (Public Affairs & Communications Officer dell'OECD);
17. 8th April 2022: "La Ricerca Collaborativa in Horizon Europe: come scrivere una proposta di successo", provided by APRE, National Contact Point di Horizon Europe;
18. 18th November 2022: "Come scrivere una proposta di successo nel programma Marie Skłodowska-Curie Actions in Horizon Europe", provided by APRE;
19. 5th December 2022: "L'impatto in Horizon Europe", provided by APRE;
20. 10th February – 17th April 2023: "Faculty Development Program", provided by University of Insubria;

21. 21st March 2023: "How to use Social Media and other Channels for Research Communication", provided by Charlie Rapple, Kudos;
22. 11th May 2023: "Horizon Europe: le postdoctoral fellowships nelle azioni Marie Skłodowska-Curie Actions (MSCA)", provided by APRE;
23. 21st September 2023: "Pubblicare con IOP – Open access and transformative agreements; how can I take advantage?", provided by CRUI, University of Insubria;
24. 4th – 5th October 2024: "Coaching for doc", provided by Fondazione Emblema, University of Insubria;
25. 3rd October 2023 – 29th January 2024: "PON Ricerca e Innovazione 2014-2020 REACT EU", provided by Ministero dell'Università e della Ricerca.

Other Certificates of Participation not already mentioned before

1. November 2018: "Samsung Innovation Camp", provided by University of Insubria.

Previous Hobbies

Quote blog   From January 2013 to February 2021, I managed a blog where I put motivational quotes.

Gardening   From Summer 2019 to Summer 2024, I had a small garden.