



# *Curriculum Vitae et Studiorum*

## **Alessandro Borri**

*PhD, Electrical and Information Engineering, 2011*

*MSc, Computer and Control Systems Engineering, 2007*

*BSc, Computer and Control Systems Engineering, 2004*

### **Main affiliation**

Institute for Systems Analysis and Computer Science (IASI) “Antonio Ruberti”  
Italian National Research Council (CNR)

### **Work Address 1:**

Biomathematics Laboratory (IASI-CNR BioMatLab)

Largo A. Gemelli 8

00168 Rome, Italy

Web page: [www.biomatematica.it](http://www.biomatematica.it)

Tel. (Office) +39 06 30 15 53 89

Fax (Office) +39 06 305 78 45

### **Work Address 2:**

IASI-CNR “Antonio Ruberti”

Via dei Taurini 19

00185 Rome, Italy

Web page: <http://www.iasi.cnr.it>

Tel. (Office) +39 06 4993 7111

Fax (Office) +39 06 4993 7137

E-mail: [alessandro.borri@iasi.cnr.it](mailto:alessandro.borri@iasi.cnr.it)

Personal web page: [www.alessandroborri.it](http://www.alessandroborri.it)

### **Other appointments**

Research affiliate – Centre of Excellence for Research DEWS

University of L’Aquila

Via G. Gronchi 18

67100 L’Aquila, Italy

---

## *Research Interests*

**Theory:** Biomathematics, Formal Methods and Symbolic Control, Cyber-Physical Systems, Nonlinear and Hybrid Control Systems, Randomized Algorithms, Filtering, Game Theory.

**Applications:** Pathophysiological models, Systems Biology, Vehicle Control and Coordination, Control over Sensor and Actuator Networks, Meteorology.

---

## *Research Experience*

➤ **April 2012 – present**

Technician at IASI-CNR, Rome, Italy.

Main research topics:

- Mathematic modeling in pathophysiology
- Systems Biology
- Symbolic networked/decentralized embedded control
- Filtering

➤ **March 2011 – January 2012**

Post-doctoral Researcher in Electrical and Information Engineering, University of L'Aquila, Italy.

Research topic: Formal methods for analysis and control of networked systems

➤ **November 2007 – March 2011**

PhD in Electrical and Information Engineering, University of L'Aquila, Italy.

Main research topics:

- Symbolic and embedded control
- Hybrid modeling and control for wireless networks
- Randomized algorithms for game theory
- Vehicle control

---

## *Education*

➤ **June 21, 2012**

Achievement of the International Curriculum Option of Doctoral Studies in Networked, Embedded, and Hybrid Control Systems for Complex, Distributed and Heterogeneous Systems (ICO-NEH).

➤ **2007-2011**

PhD in Electrical and Information Engineering, University of L'Aquila, Italy.

- Thesis: *Hybrid Control of Cyber-Physical Systems*
- Advisor: Prof. Maria Domenica Di Benedetto
- Co-Advisor: Dr. Giordano Pola
- PhD Review Committee: Prof. Patrizio Colaneri, Prof. Alfredo Germani, Prof. Luca Benvenuti, Prof. Karl Henrik Johansson.
- Grade: *Excellent*

➤ **2004-2007**

Master of Engineering in Control Systems and Computer Science, Department of Electrical and Information Engineering, University of L'Aquila, Italy.

Full marks (110/110 *magna cum laude*).

- Thesis: *Integrated Vehicle Control using Active Front Steering and Active Differential*
- Advisor: Prof. Maria Domenica Di Benedetto
- Co-Advisor: Mr. Gilberto Burgio

➤ **2001-2004**

Bachelor of Engineering in Control Systems and Computer Science, Department of Electrical and Information Engineering, University of L'Aquila, Italy.

Full marks (110/110 *magna cum laude*).

- Thesis: *Polynomial Extended Kalman Filter for simultaneous state-parameter estimation*
- Advisor: Prof. Alfredo Germani
- Co-Advisor: Prof. Costanzo Manes

➤ **1996-2001**

High School, "Liceo Scientifico E. Fermi", Sulmona (AQ), Italy. Full marks (100/100).

---

## *Visiting Positions*

➤ **November 2<sup>nd</sup>, 2011 – January 31<sup>st</sup>, 2012**

Visiting Researcher at the Royal Institute of Technology (KTH), Stockholm (Sweden), ACCESS Linnaeus Center.

➤ **September 15<sup>th</sup>, 2009 – June 15<sup>th</sup>, 2010**

Visiting Research Scholar at the University of California, Santa Barbara, ECE Department.

➤ **April 13<sup>th</sup> – 26<sup>th</sup>, 2009**

**November 7<sup>th</sup> – December 15<sup>th</sup>, 2008**

Short time visitor at the University of California, Berkeley, EECS Department, in the Team for Research in Ubiquitous Secure Technology (TRUST).

---

## *Industrial Experience*

➤ **December 2010 - February 2011**

Editorial Collaboration, Alicubi srl, Torino (Italy).

Topic: writing entries about Information Engineering for Piccola Treccani Encyclopedia 2011.

➤ **December 18<sup>th</sup>, 2006 – June 22<sup>nd</sup>, 2007**

Internship at the Ford European Research Center, Aachen (Germany).

Topic: modeling, design and implementation of a vehicle attitude control system.

## *Graduate and Doctoral Courses*

---

- **International Graduate School on Control 2014 - Convergence theory for observers: Necessary and Sufficient conditions** (Prof. L. Praly) – L’Aquila, Italy, April 2014.
- **SIDRA Summer School 2013 (Part 2) – Vehicle Dynamics Control** (Prof. P. Falcone, Prof. L. Glielmo, Prof. S. Savaresi, Prof. M. Tanelli) - Bertinoro (FC), Italy, July 2013.
- **SIDRA Summer School 2013 (Part 1) – Systems Biology** (Prof. C. Altafini, Prof. F. Blanchini, Prof. E. Cinquemani, Prof. C. Cosentino, Prof. G. De Nicolao) - Bertinoro (FC), Italy, July 2013.
- **EECI-HYCON2 Graduate School on Control 2013 - Optimality, Stabilization, and Feedback in Nonlinear Control** (Prof. F. Clarke) – L’Aquila, Italy, May 2013.
- **EECI-HYCON2 Graduate School on Control 2012 – Specification, design and verification of distributed control systems** (Prof. R. M. Murray) – L’Aquila, Italy, May 2012.
- **Time-Delay Systems** (Prof. P. Pepe) – University of Rome “La Sapienza”, Rome, Italy, May 2012.
- **EECI-HYCON2 Graduate School on Control 2011 – Robust Hybrid Control Systems** (Prof. R. G. Sanfelice) – SUPELEC - Gif-sur-Yvette, France, May 2011.
- **HYCON-EECI Graduate School on Control 2010 - Optimality, Stabilization, and Feedback in Nonlinear Control** (Prof. F. Clarke) – SUPELEC - Gif-sur-Yvette, France, March 2010.
- **Nonlinear Control Systems** (Prof. A. Teel) – University of California, Santa Barbara (CA), U.S.A., Winter 2010.
- **Noncooperative Game Theory** (Prof. J. P. Hespanha) – University of California, Santa Barbara (CA), U.S.A., Fall 2009.
- **Cooperative Control of Robotic Networks** (Prof. F. Bullo) – University of California, Santa Barbara (CA), U.S.A., Fall 2009.
- **SIDRA Summer school 2009 - Lyapunov methods for constrained and robust control of dynamic systems** (Prof. F. Blanchini, Prof. P. Colaneri, Prof. A. Garulli, Prof. S. Miani, Prof. R. Scattolini, Prof. A. Tesi, Prof. L. Zaccarian) - Bertinoro (FC), Italy, July 2009.
- **WSN School: An introduction to wireless sensor network programming using Contiki** (Prof. Fredrik Osterlind) - Siena (SI), Italy, July 2009.
- **3rd WIDE PhD School on Networked Control Systems** (Prof. A. Bemporad, Prof. P. R. Kumar, Prof. L. Schenato, Prof. F. Bullo, Prof. A. Cervin, Prof. M. Johansson, Prof. S. Lall, Prof. M. Heemels, Prof. H. Ishii, Prof. M. Lemmon) - Siena (SI), Italy, July 2009.

- **SIDRA Summer School 2008 – Introduction to Nonlinear Control** (Prof. A. Isidori, Prof L. Marconi, Prof. A. Astolfi, Prof. F. Celani, Prof. A. Serrani) – Bertinoro (FC), Italy, July 2008.
- **HYCON-EECI Graduate School on Control 2008 - Introduction to Networked Control Systems** (Prof. R. M. Murray) – SUPELEC - Gif-sur-Yvette, France, March 2008.
- **Graduate School on Technologies, Applications and Services in Heterogeneous Radio Networks** - University of L’Aquila, L’Aquila (Italy), December 2007 – June 2008.

---

## *Attended Conferences*

- **52nd IEEE Conference on Decision and Control**. Florence, Italy, December 10-13, 2013.
- **SIDRA Congress 2013**. Palermo, Italy, September 16-18, 2013.
- **2013 American Control Conference**. Washington, DC, USA, June 17-19, 2013.
- **51st IEEE Conference on Decision and Control**. Maui, HI, USA, December 10-13, 2012.
- **SIDRA Congress 2012**. Benevento, Italy, September 12-14, 2012.
- **SIMAI Congress 2012**. Turin, Italy, June 26-28, 2012.
- **IFAC World Congress 2011**. Milan, Italy, August 28-September 2, 2011.
- **SIDRA Congress 2010**. L’Aquila, Italy, September 13-15, 2010.
- **Hybrid Systems: Computation and Control 2009**. San Francisco, CA, USA, April 13-15, 2009.
- **47th IEEE Conference on Decision and Control**. Cancun, Mexico, December 9-11, 2008.

---

## *Collaborations*

- *Ruzena Bajcsy* (University of California, Berkeley, CA, USA)
- *Alberto Maria Bersani* (University of Rome "La Sapienza", Italy)
- *Domenico Bianchi* (University of L'Aquila, Italy)
- *Shaunak Dattaprasad Bopardikar* (United Technologies Research Center, Berkeley, CA, USA)
- *Gilberto Burgio* (Dana Corporation, Trento, Italy)
- *Francesco Carravetta* (IASI-CNR, Rome, Italy)
- *Bernardino Castillo Toledo* (Instituto Politecnico Nacional de los Estados Unidos Mexicanos, Mexico)
- *Andrea De Gaetano* (BioMatLab, IASI-CNR, Rome, Italy)
- *Maria Domenica Di Benedetto* (University of L'Aquila, Italy)

- *Maria-Gabriella Di Benedetto* (University of Rome "La Sapienza", Italy)
- *Stefano Di Gennaro* (University of L'Aquila, Italy)
- *Dimos V. Dimarogonas* (KTH Royal Institute of Technology, Stockholm, Sweden)
- *Annarita Giani* (University of California, Berkeley, CA, USA)
- *Joao Pedro Hespanha* (University of California, Santa Barbara, CA, USA)
- *Karl Henrik Johansson* (KTH Royal Institute of Technology, Stockholm, Sweden)
- *Levente Kovács* (Obuda University, Hungary)
- *Gabriella Mavelli* (IASI-CNR, Rome, Italy)
- *Pasquale Palumbo* (IASI-CNR, Rome, Italy)
- *Simona Panunzi* (BioMatLab, IASI-CNR, Rome, Italy)
- *Giordano Pola* (University of L'Aquila, Italy)
- *Maria Prandini* (Politecnico di Milano, Italy)
- *Claire Tomlin* (University of California, Berkeley, CA, USA)

---

## *Projects*

- EU FP7 NoE **HYCON2**: Highly-complex and networked control systems.
- EU FP7 **EDEN**: End-user driven demo for CBRNE.
- EU FP7 **PULSE**: Platform for European medical support during major emergencies.
- EU FP7 **IMPRESS**: Improving Preparedness and Response of Health Services in Major Crises.

---

## *Publications*

### **Peer-reviewed International Publications**

- A. M. Bersani, **A. Borri**, F. Carravetta, G. Mavelli, and P. Palumbo, *Quasi-Steady-State Approximations of the Chemical Master Equation in Enzyme Kinetics - Application to the Double Phosphorylation/Dephosphorylation Cycle*, IEEE Conference on Decision and Control (CDC 2014), Los Angeles, CA, USA (to appear).
- S. Panunzi, **A. Borri**, P. Palumbo, L. Kovács, and A. De Gaetano, *Simulation of insulin regimen and glucose profiles in Type 1 Diabetic Patient*, IEEE International Conference on Systems, Man, and Cybernetics (SMC2014), San Diego, CA, USA (to appear).
- **A. Borri**, G. Pola, and M. D. Di Benedetto, *Symbolic Control Design of Nonlinear Networked Control Systems*, submitted for journal publication, 2014.
- **A. Borri**, F. Carravetta, G. Mavelli, and P. Palumbo, *Block-tridiagonal state-space realization of Chemical Master Equations: a tool to compute explicit solutions*, submitted for

journal publication, 2014.

- **A. Borri**, M. D. Di Benedetto, and G. Pola, *Towards a Unified Theory for the Control of CPS: A Symbolic Approach*, ERCIM News No. 97, April 2014.
- **A. Borri**, D. Bianchi, M. D. Di Benedetto, and S. Di Gennaro, *Vehicle Attitude Control with Saturating Actuators: Workload Balancing and Reference Adaptation*, Proceedings of the 52nd IEEE Conference on Decision and Control (CDC 2013), Florence, Italy, pp. 1558-1563, 2013.
- **A. Borri**, D. V. Dimarogonas, K. H. Johansson, M. D. Di Benedetto, and G. Pola, *Decentralized symbolic control of interconnected systems with application to vehicle platooning*, Proceedings of the 4th IFAC Workshop on Distributed Estimation and Control in Networked Systems (NecSys 2013), Koblenz, Germany, pp. 285-292, 2013.
- **A. Borri**, F. Carravetta, G. Mavelli, and P. Palumbo, *Chemical Master Equations: a mathematical scheme for the multi-site phosphorylation case*, Proceedings of the 3rd International Conference on Simulation and Modeling Methodologies, Technologies and Applications (SIMULTECH 2013), Special Session on Modelling and Simulation in Biology and Medicine (BIOMED 2013), Reykjavik, Iceland, pp. 681-688, 2013.
- **A. Borri**, F. Carravetta, G. Mavelli, and P. Palumbo, *Some results on the structural properties and the solution of the Chemical Master Equation*, Proceedings of the 2013 American Control Conference (ACC 2013), Washington, DC, USA, pp. 3777-3782, 2013.
- S. D. Bopardikar, **A. Borri**, J. P. Hespanha, M. Prandini, and M. D. Di Benedetto, *Randomized Sampling for Large Zero-Sum Games*, *Automatica*, 49(5): 1184-1194, May 2013.
- **A. Borri**, G. Pola, and M. D. Di Benedetto, *Integrated Symbolic Design of Unstable Nonlinear Networked Control Systems*, Proceedings of the 51<sup>st</sup> IEEE Conference on Decision and Control (CDC 2012), Maui, HI, USA, pp. 1374-1379, 2012.
- **A. Borri**, G. Pola, and M. D. Di Benedetto, *Symbolic models for nonlinear control systems affected by disturbances*, *International Journal of Control*, Vol. 85, No. 10, pp. 1422-1432, 2012.
- **A. Borri**, G. Pola, and M. D. Di Benedetto, *A symbolic approach to the design of nonlinear networked control systems*, Proceedings of the 15th ACM international conference on Hybrid Systems: Computation and Control, ser. HSCC '12, I. Mitchell and T. Dang Eds., New York, NY, USA, pp. 255-264, 2012.
- G. Pola, **A. Borri**, and M. D. Di Benedetto, *Integrated design of symbolic controllers for nonlinear systems*, *IEEE Transactions on Automatic Control*, 57(2): 534-539, Feb. 2012.
- D. Bianchi, **A. Borri**, B. Castillo-Toledo, M. D. Di Benedetto, and S. Di Gennaro, *Smart Management of Actuator Saturation in Integrated Vehicle Control*, Proceedings of the 50th IEEE Conference on Decision and Control and European Control Conference (CDC-ECC 2011), Orlando, FL, USA, pp. 2529-2534, 2011.
- **A. Borri**, G. Pola, and M. D. Di Benedetto, *Alternating Approximately Bisimilar Symbolic Models for Nonlinear Control Systems affected by Disturbances*, Proceedings of the 50th IEEE Conference on Decision and Control and European Control Conference (CDC-ECC 2011), Orlando, FL, USA, pp. 552-557, 2011.
- D. Bianchi, **A. Borri**, B. Castillo-Toledo, M. D. Di Benedetto, and S. Di Gennaro, *Active Control of Vehicle Attitude with Roll Dynamics*, Proceedings of the 18<sup>th</sup> IFAC World Congress, Milan, Italy, pp. 7174-7179, 2011.
- **A. Borri**, S. D. Bopardikar, J. P. Hespanha, and M. D. Di Benedetto, *Hide-and-Seek with Directional Sensing*, Proceedings of the 18<sup>th</sup> IFAC World Congress, Milan, Italy, pp. 9343-9348, 2011.
- S. D. Bopardikar, **A. Borri**, J. P. Hespanha, M. Prandini, and M. D. Di Benedetto, *Randomized Sampling for Large Zero-Sum Games*, Proceedings of the 49<sup>th</sup> IEEE Conference on Decision and Control (CDC 2010), Atlanta, GA, USA, pp. 7675-7680, 2010.
- **A. Borri**, G. Pola, and M. D. Di Benedetto, *An integrated approach to the symbolic control*

*design of nonlinear systems with infinite states specifications*, Proceedings of the 49<sup>th</sup> IEEE Conference on Decision and Control (CDC 2010), Atlanta, GA, USA, pp. 1528-1533, 2010.

- D. Bianchi, **A. Borri**, G. Burgio, M. D. Di Benedetto, and S. Di Gennaro, *Adaptive Integrated Vehicle Control using Active Front Steering and Rear Torque Vectoring*, International Journal of Vehicle Autonomous Systems (IJVAS), Special Issue on Autonomous and Semi-Autonomous Control for Safe Driving of Ground Vehicles, Vol. 8, No.2/3/4, pp. 85-105, 2010.
- D. Bianchi, **A. Borri**, G. Burgio, M. D. Di Benedetto, and S. Di Gennaro, *Adaptive Integrated Vehicle Control using Active Front Steering and Rear Torque Vectoring*, Proceedings of the joint 48th IEEE Conference on Decision and Control and 28th Chinese Control Conference (CDC-CCC 2009), Shanghai, China, pp. 3557-3562, 2009.
- R. Bajcsy, **A. Borri**, A. Giani, M. D. Di Benedetto, and C. Tomlin, *Classification of Physical Interactions between Two Subjects*, Proceedings of the 6<sup>th</sup> International Workshop on Wearable and Implantable Body Sensor Networks (BSN 2009), Berkeley, CA, USA, pp. 187-192, 2009.
- **A. Borri**, M. D. Di Benedetto, and M.-G. Di Benedetto, *Hybrid Modelling, Power Management and Stabilization of Cognitive Radio Networks*, Hybrid Systems: Computation and Control 2009, P. Tabuada and R. Majumdar Eds., Lecture Notes in Computer Science (LNCS) 5469, pp. 76-89, Springer-Verlag, Berlin Heidelberg, 2009.

## Theses

- **A. Borri**, *Hybrid Control of Cyber-Physical Systems*, Doctoral Thesis, Department of Electrical and Information Engineering, University of L'Aquila, Italy, 2011.
- **A. Borri**, *Integrated Vehicle Control using Active Front Steering and Active Differential*, Master Thesis, Department of Electrical and Information Engineering, University of L'Aquila, Italy, 2007.
- **A. Borri**, *Polynomial Extended Kalman Filter for simultaneous state-parameter estimation*, Bachelor Thesis, Department of Electrical and Information Engineering, University of L'Aquila, Italy, 2004 (in Italian).

---

## *Professional and Editorial Activities*

- Member of **IEEE** (Institute of Electrical and Electronics Engineers), **IEEE Control Systems Society**, **IEEE Engineering in Medicine and Biology Society** and **IEEE Life Sciences Community**.
- **ICO-NEH Student** (International Curriculum Option of Doctoral Studies in Networked, Embedded, and Hybrid Control Systems for Complex, Distributed and Heterogeneous Systems) of the NoE HYCON (2008-2012).
- **EECI Student** (European Embedded Control Institute).
- Journal Referee for: IEEE Transactions on Control Systems Technology, IEEE Transactions on Automatic Control, Automatica, International Journal of Robust and Nonlinear Control, IET Control Theory & Applications, Control Engineering Practice, International Journal of Systems Science, Proceedings of the Institution of Mechanical Engineers, Part D: Journal of Automobile Engineering.
- **Professional degree** in Information Engineering (2007).



## *Conference Services*

---

- Co-chair of the session *Motion Planning and Stochastic Modeling* at the SIDRA Congress 2013 Palermo, Italy, September 2013.
- Co-chair of the sessions *Delay Systems III* and *Systems Biology* at the 2013 American Control Conference, Washington, DC, USA, June 2013.
- Chair of the session *Networked Control Systems III* at the 51<sup>st</sup> IEEE Conference on Decision and Control (CDC 2012), Maui, Hawaii, USA, December 2012.
- Member of the Technical Program Committee for the 5<sup>th</sup> International Workshop on Wireless Sensor, Actuator and Robot Networks (WiSARN 2012-Spring), Hangzhou, China, May 2012.
- Co-chair of the session *Differential or Dynamic Games* at the IFAC World Congress 2011, Milan, Italy, August 2011.
- Conference Reviewer for: Hybrid Systems Computation and Control (HSCC), IEEE Conference on Decision and Control (CDC), IEEE American Control Conference (ACC), IEEE Mediterranean Conference on Control and Automation (MED), IEEE Multi-conference on Systems and Control (MSC), IFAC Workshop on Distributed Estimation and Control in Networked Systems (NecSys).

## *Teaching Experience*

---

Lecturer (with P. Palumbo) of the course **Systems Biology: an Introduction**, held at IASI-CNR, Rome, Italy, March 2014.

Teaching assistant in the following courses at the University of L'Aquila:

- **Hybrid Systems** (A.A. 2010-11, A.A. 2011-12 and A.A. 2013-14), held jointly by Prof. M. D. Di Benedetto and Dr. A. D'Innocenzo (taught in Italian).
- **Embedded Systems** (A.A. 2010-11, A.A. 2011-12 and A.A. 2012-13), held jointly by Prof. M. D. Di Benedetto and Dr. L. Pomante (taught in Italian).
- **Systems Biology** (A.A. 2012-13), held by Prof. P. Palumbo (taught in English).
- **Mathematical Models in Life Sciences** (A.A. 2011-12), held by Prof. P. Palumbo (taught in English).
- **Elements of Linear Systems Theory** (A.A. 2010-11), held by Dr. G. Pola (taught in Italian).
- **Automatic Control** (A.A. 2007-08, A.A. 2008-09 and A.A. 2010-11), held jointly by Prof. M. D. Di Benedetto and Prof. S. Di Gennaro (taught in Italian).
- **Control Systems** (A.A. 2008-09), held jointly by Prof. M. D. Di Benedetto and Prof. S. Di Gennaro (taught in English).

Co-tutorship in the following Master Theses at the University of L'Aquila:

- Savino D'Eramo, **Analysis and Testing of Software Development Environments for Embedded Platforms** (in Italian), 2012. Tutor: Prof. Luigi Pomante.
- Stefano Perrotti, **Symbolic Methods for the Control of Nonlinear Systems over Communication Networks** (in Italian), 2012. Tutor: Prof. Giordano Pola.

## Grants

---

- POF-SE-Abruzzo Scholarship for research abroad (2011).
- PORAbruzzo Scholarship for research abroad (2010).
- URI (International Relations Office) Scholarship (2008).

## Talks

---

- **May 29<sup>th</sup>, 2014**  
*The Chemical Master Equation*, given at the IEIIT-CNR, Turin (Italy).
- **May 21<sup>st</sup>, 2014**  
*Control of Complex Systems: a Symbolic Approach*, given at the Department of Information Engineering, Computer Science and Mathematics, University of L'Aquila (Italy).
- **January 30<sup>th</sup>, 2012**  
*Decentralized Symbolic Models and Controllers*, given at the Royal Institute of Technology (KTH), Stockholm (Sweden), ACCESS Linnaeus Center.
- **November 14<sup>th</sup>, 2011**  
*Discrete Abstractions and Symbolic Control*, given at the Royal Institute of Technology (KTH), Stockholm (Sweden), ACCESS Linnaeus Center.
- **December 5<sup>th</sup>, 2008**  
*Interaction between Two Subjects*, given at the University of California, Berkeley, EECS Department, TRUST Research Center.
- **June 22<sup>nd</sup>, 2007**  
*Active Front Steering and Active Differential Integration*, given at the Ford European Research Center, Aachen (Germany).

## Programming skills

---

- Modeling/Desktop/Web languages: C++, Java, Php, UML, HTML, JavaScript, SQL.
- Control and Embedded Computation: Matlab, nesC, TinyOS 2.x.
- Development environments and visual tools: Joomla!, Netbeans IDE.

## Language skills

---

- Italian (native language), English (good).