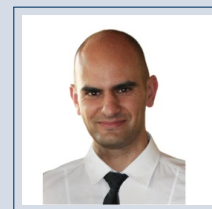


Federico Tramarin

Curriculum Vitæ et Studiorum

+39 (328) 689 1156
✉ federico.tramarin@unimore.it
📄 trama.github.io
federico-tramarin
trama



Associate Professor – Università degli Studi di Modena e Reggio Emilia, Italy

Personal Data

Place and Date of birth	8 September 1984 Badia Polesine (RO)	Citizenship	Italian
email	federico.tramarin@unimore.it	Skype	tramarin_federico

Current Academic Positions

05/2020 – **Associate Professor**, *University of Modena and Reggio Emilia*
Department of Engineering "Enzo Ferrari" (DIEF).
Via Pietro Vivarelli 10 – I-41125 Modena, Italy

Italian Scientific Habilitation

02/2023 – **Habilitation for Full Professor**, *Italian Ministry of Research,*
National Habilitation for the role of Full Professor.
Scientific sector: 09/E4 - Electronic Measurements and Instrumentation

Citation Statistics

Citations	1401 (GScholar) / 982 (Scopus)	h-index	18 (GScholar) / 15 (Scopus)
------------------	--------------------------------	----------------	-----------------------------

Academic education

PhD

2009–2011 **PhD in Information Science and Technologies, cycle XXIV**, Department of Information Engineering.
University of Padova, Padova, Italy

Thesis title	<i>Industrial Wireless Sensor Networks. Simulation and measurements in an interfering environment</i>	Final grade	Excellent ("Ottimo")
---------------------	---	--------------------	----------------------

Defense date	April 19th, 2012	Advisor	Prof. M. Bertocco
---------------------	------------------	----------------	-------------------

Master Degree

2006–2008 **Master Degree in Electronic Engineering**, *Department of Information Engineering, University of Padova,*
Padova, Italy.

Grade 110/110 (*cum laude*), GPA 29.77/30 over 13 exams

Research Grants

04/2014 – **Post-Doc Research Grant**, *National Research Council of Italy.*

03/2018 *Institute of Electronics, Computer and Telecommunication Engineering (IEIIT), Torino, Italy,*
Contract no. IEIIT/02/2014/TO.

01/2013 – **Post-Doc Research Grant**, *National Research Council of Italy.*

12/2013 *Institute of Electronics, Computer and Telecommunication Engineering (IEIIT), Torino, Italy,*
Contract no. IEIIT/29/2012/TO.

01/2012 – **Post-Doc Research Grant**, *Electronic Measurement Research Group,*

12/2012 *Department of Information Engineering, University of Padova, Italy,*
Contract no. 97/2011.

Under supervision of prof. Claudio Narduzzi

Direction or Participation of Research Groups, characterized by National or International Collaborations

2021 – Co-Director of the Wireless TSN Research Group, *Participants: Intel Labs (Oregon, USA), University of Modena and Reggio Emilia, University of Padova, National Research Council*,
Topics: Development and performance assessment of innovative and high performance distributed measurement systems through wireless TSN networks.
Personal role: Co-Founder of the research group, Director of the Modena unit.

2021-2022 Director of the SHeMS research group, *Participants: IoT research group (Dept. Engineering, Unimore) and Cardiology Research group (Polyclinic Unimore)*,
Topics: Design, development and testing of novel smart healthcare modular system for personalized remote health monitoring
Personal role: Director and Principal Investigator.

2020- Co-Director of the IoT in Factory Automation research group, *Participants: IoT research group (Dept. Engineering, Unimore) University of Padova, National Research Council*,
Topics: Research related to measurement and networking technologies in the field of industrial and factory automation, with an interdisciplinary approach based on measurement, control and computer sciences.
Personal role: Founder of the research group, Director of the Modena unit.

Scientific Responsibility in Research Projects funded through competitive calls

2023 – PRIN2022-PNRR (P2022JMKEN), *Time Sensitive Networking for future enabling technologies: measurement methods and metrological characterization in hybrid wired/wireless scenarios*, Project funded by the Italian Ministry of Research (MUR), University of Modena and Reggio Emilia,
Total funding: 232.000 €
Head of the Research Unit at the University of Modena and Reggio Emilia
Principal investigator: Prof. Domenico Capriglione, University of Cassino
Other unit leaders: prof. E. Sisinni, Dott. C. Zunino.

2021 – SHeMS, *Smart Healthcare Modular System for Personalized Remote Health Monitoring*, Project funded by a competitive call (FAR Mission Oriented), University of Modena and Reggio Emilia,
Total funding: 74.000 €
Principal investigator: Prof. Federico Tramarin, University of Modena and Reggio Emilia
Call no. FARMO – 1/12/2021.

2019 INTERACT, *Industrial inTernet of things architEctuRes and Algorithms for time-critical Cyber-physical sysTems*, Project funded by a competitive call (BIRD funding), University of Padua,
Total funding: 41.000 €
Principal investigator: Dr. Ing. Federico Tramarin, University of Padova
Call no. BIRD194014 – 15/03/2019.
Other members: Prof. Roberto Oboe, T. Caldognetto, A. Sona.

2017 MAgIC, *Multi-Agent Intelligent Control of time-critical Cyber-Physical Systems over wireless*, Project funded by a competitive call (BIRD funding),
Work Package Leader
Total funding: 60.000 €
Principal investigator: prof. Luca Schenato, University of Padova
Call no. BIRD 175771 – 15/05/2017.
Other members: S. Ghidoni, S. Milani, A. Cenedese, R. Oboe.
Responsible for the activities in two work packages of the project

2014 & 2016 IMET2AL, *genomlc Model prEdictive conTrol Tools for evolutionAry pLants*, within the framework of “Flagship project *La Fabbrica del Futuro*”, CNR,
Total funding: 312.500 €
Total funding per research operating Unit: 104.168 €
Principal investigator: Dott. Ivan Cibrario Bertolotti, IEIT-CNR
Protocol no. 321 – 19/02/2014.
Dr. Tramarin participated as a Member of the research Unit

- 2013-2014 GECKO**, *Generic Evolutionary Control knowledge-based Module*, within the framework of “Flagship project *La Fabbrica del Futuro*”, CNR,
Total funding: 700.000 €
Total funding per research operating Unit: 212.600 €
Principal investigator: Anna Valente, ITIA-CNR (then Alessandro Brusafferri, ITIA-CNR)
Protocol no. 312 — 18/02/2014.
Dr. Tramarin participated as a Member of the research Unit
- 2011-2012 IMPROVE**, *Implementing Manufacturing science solutions to increase equipment productivity and performance*, Joint Technological Initiative (JTI) ENIAC. Project co-funded by Italian Ministry of Research MIUR (66.7%) e European Community (33.3%),
Total funding: 18.160.970 €
Total funding per research operating Unit: 369.500 €
Principal investigator: Dott. Francois Finck, ST Microelectronics, Crolles, France
Protocol no. 642 — 29/04/2016.
Dr. Tramarin participated as a Member of the research Unit
- 2011-2013 PRIN 2009**, *Characterisation and performance measurement in hybrid smart transducer networks: innovative experimental methods and instrumentation*, University of Padova — Ministry of Instruction, University and Research,
Total funding: 335.720 €
Total funding per research operating Unit: 81.389 € — University of Padova
Total funding per research operating Unit: 78.600 € — National Research Council of Italy
Principal investigator: prof. Claudio Narduzzi, University of Padova
Contract no. 2009ZTT5N4_001 and 2009ZTT5N4_003 — 31/05/2010.
Dr. Tramarin participated as a Member of the research Unit of the University of Padova for years 2011–2012
He participated as a Member of the research Unit of the National research Council of Italy for year 2013
- 2010-2012 PRIN 2008**, *Measurements, and accuracy evaluation in wireless space-time localization applications under real-life conditions*, University of Padova — Ministry of Instruction, University and Research,
Total funding: 101.224 €
Total funding per research operating Unit: 24.200 € — University of Padova
Principal investigator: prof. Paolo Carbone, University of Perugia
Contract no. 2008TK5B55_004 — 22/03/2010.
Dr. Tramarin participated as a Member of the research Unit of the University of Padova

Organization of Scientific Conferences both National and International

Membership in the Organizing Committee of International Conferences

General Chair

- 2024** General Chair
4th IEEE Intl. Workshop on Metrology for Automotive, METROAUTOMOTIVE 2024, Bologna, Italy.

Program Chair

- 2024** Program Chair
7th Intl. Symposium on Measurements & Networking, IEEE M&N 2024, Rome, Italy.
- 2024** Program Chair
29th IEEE Intl. Conference on Emerging Technologies and Factory Automation, ETFA 2024, Padova, Italy.
- 2023** *Program Co-Chair*
3rd IEEE Intl. Workshop on Metrology for Automotive, METROAUTOMOTIVE 2023, Modena, Italy
- 2022** *Program Co-Chair*
2nd IEEE Intl. Workshop on Metrology for Automotive, METROAUTOMOTIVE 2022, Modena, Italy
- 2022** *Program Co-Chair*
9th EAI International Conference on IoT Technologies for HealthCare, Braga, Portugal

Track Chair

- 2024** *Associate Technical Program Co-Chair*
IEEE Intl. Instrumentation and Measurement Technology Conference, IEEE I2MTC 2024, Glasgow, UK
- 2023** *Associate Technical Program Co-Chair*
IEEE Intl. Instrumentation and Measurement Technology Conference, IEEE I2MTC 2023, Kuala Lumpur, Malaysia
- 2022** *Associate Technical Program Co-Chair*
IEEE Intl. Instrumentation and Measurement Technology Conference, IEEE I2MTC 2022, Ottawa, Canada

- 2023** *Track Co-Chair*
28th IEEE Intl. Conference on Emerging Technologies and Factory Automation, ETFA 2021, Sinaia, Romania
- 2022** *Track Co-Chair*
27th IEEE Intl. Conference on Emerging Technologies and Factory Automation, ETFA 2021, Stuttgart, Germany

Special Session/Workshop Chair

- 2022** *Special Session Co-Chair*
6th IEEE Intl. Symposium on Measurements & Networking, IEEE M&N 2022, Padova, Italy
- 2021** *Special Session Co-Chair*
1st IEEE Intl. Workshop on Metrology for Automotive, METROAUTOMOTIVE 2021, Virtual Conference
- 2021** *Workshop Co-Chair*
26th IEEE Intl. Conference on Emerging Technologies and Factory Automation, ETFA 2021, Västerås, Sweden
- 2021** *Special Session Co-Chair*
19th IEEE Intl. Conference on Industrial Informatics, INDIN 2021, Palma de Mallorca, Spain
- 2020** *Special Session Co-Chair*
25th IEEE Intl. Conference on Emerging Technologies and Factory Automation, ETFA 2020, Vienna, Austria
- 2019** *Work-in-Progress, Tutorial e Demo Co-Chair*
18th IEEE Intl. Conference on Dependable, Autonomic and Secure Computing, DASC 2020, Calgary, Canada

Organization of Special Sessions

- 2023** “Innovative Measurement and methodologies for future communication systems and applications”, IEEE Intl. Instrumentation and Measurement Technology Conference, IEEE I2MTC 2023, Kuala Lumpur, Malaysia
- 2023** “Reliable Wireless Solutions for IoT and Industrial IoT”, 2023 IEEE International Workshop on Metrology for Industry 4.0 & IoT, IEEE METROIND4.0&IOT, Brescia, Italy
- 2022** “IoT-Based Smart Measurement Systems: New Communication and Artificial Intelligence Techniques”, IEEE Intl. Instrumentation and Measurement Technology Conference, IEEE I2MTC 2022
- 2022** “Reliable Wireless Solutions for IoT and Industrial IoT”, 2023 IEEE International Workshop on Metrology for Industry 4.0 & IoT, IEEE METROIND4.0&IOT, Trento, Italy
- 2021** “Enhancing smart measurement systems with artificial intelligence for the automotive industry of the future”, 1st IEEE Intl. Workshop on Metrology for Automotive, METROAUTOMOTIVE 2021, Modena, Italy
- 2021** “Smart Measuring Systems and Measures for the Management of Emergencies. The case of COVID19 pandemic, and beyond”, IEEE International Instrumentation and Measurement Technology Conference, I2MTC 2021
- 2020** “Industrial Cyber-Physical Systems: Applications, Challenges and Trends”, IEEE International Industrial Electronics Conference, IECON 2020
- 2020** “Emerging communication and computing technologies for the Industrial Cyber Physical Systems”, 18th IEEE International Conference on Industrial Informatics, INDIN 2020
- 2019** “Industrial Cyber-Physical Systems: new trends in computing and communications”, 24th IEEE Int. Conference on Emerging Technologies and Factory Automation, ETFA 2019
- 2019** “Communications and Computing for Fog Based Control Systems”, 17th IEEE International Conference on Industrial Informatics, INDIN 2019
- 2017** “Wireless Sensor Networks in the Internet of Things Era”, 12th IEEE International Instrumentation and Measurement Technology Conference, I2MTC 2017

Membership in Technical Program Committees

- 2019**
- TPC, 2nd IEEE International Conference on Industrial Internet, ICII 2019
 - TPC, 8th ACM International Conference on Networks, Communication and Computing, ICNCC 2019
 - TPC, 24rd IEEE Intl. Conf. on Emerging Technologies and Factory Automation, ETFA 2019
 - TPC, 17th IEEE International Conference on Industrial Informatics, INDIN 2019
 - TPC, IEEE Int. Instrumentation and Measurement Technology Conf., I2MTC 2019
 - TPC, 15th IEEE World Conference on Factory Communication Systems, WFCS 2019

- 2018**
 - TPC, 23rd IEEE Intl. Conf. on Emerging Technologies and Factory Automation, ETFA 2018
 - TPC, 26th IFIP/IEEE International Conf. on Very Large Scale Integration, VLSI-SOC 2018
 - TPC, 16th IEEE International Conference on Industrial Informatics, INDIN 2018
 - TPC, IEEE Int. Instrumentation and Measurement Technology Conf., I2MTC 2018
 - TPC, 27th International Conf. on Computer Communications and Networks (ICCCN 2018)
 - TPC, 3rd Symposium on Advances in Applied Informatics (SAI 2018)
- 2017**
 - TPC, 26th International Conf. on Computer Communications and Networks (ICCCN 2017)
 - TPC, 15th IEEE International Conference on Industrial Informatics, INDIN 2017
 - TPC, 18th IEEE Annual International Conference on Industrial Technology, ICIT 2017
 - TPC, IEEE International Workshop on Measurement and Networking, M&N 2017
 - TPC, IEEE Int. Instrumentation and Measurement Technology Conf., I2MTC 2017
- 2016**
 - TPC, 12th IEEE World Conference on Factory Communication Systems, WFCS 2016
 - TPC, 5th IEEE Intl. Conf. on Computing, Communications and Informatics, ICACCI 2016
- 2015**
 - TPC, 11th IEEE World Conference on Factory Communication Systems, WFCS 2015
 - TPC, 3rd IEEE International Workshop on Measurement and Networking, M&N 2015

Participation in the faculty board of PhD programs recognized by the Ministry

- 2023—** Member of the PhD Faculty Board of the PhD Programme in “Information and Communication Technologies”, Dept. of Engineering, University of Modena and Reggio Emilia, Italy.
- 2018-2023** Member of the PhD Faculty Board of the PhD Course in “Mechatronic and Product Innovation Engineering”, Dept. Management and Engineering, University of Padua, Italy.
- 2018-2020** Responsible for the Teaching Coordination within PhD School in “Mechatronic and Product Innovation Engineering”, Dept. Management and Engineering, University of Padua, Italy.

PhD students supervisor

- 2020-2023** PhD Thesis supervisor of Dr. Tommaso Fedullo, that is within both the Dept. Management and Engineering, University of Padua, Italy and the Dept. of Engineering E. Ferrari, University of Modena, Italy
- Co-Supervisor** — I have been Co-Supervisor for one former PhD student, Dr. Michele Luvisotto, at the Dept. of Information Engineering, University of Padua, Italy. Dr. Luvisotto successfully defended his PhD thesis and is now within Hitachi PowerGrid Research, Sweden.
- I have been Co-Supervisor of two PhD students, Dr. Alberto Morato and Dr. Giovanni Peserico, both at the Dept. of Information Engineering, University of Padua, Italy, whose Supervisor is prof. S. Vitturi.

Responsibilities in Academic Activities

- Internship Commission** Responsible of the Commission for the Evaluation of Internships, Master’s Degree in Electric Vehicle Engineering, University of Bologna, Italy.
- Quality Commission** Member of the Commission for Quality Enhancement, Department of Engineering “E. Ferrari”, University of Modena and Reggio Emilia, Italy.
- Responsible for Quality Assurance for the Master and Bachelor Degrees in Electronics Engineering, Department of Engineering “E. Ferrari”, University of Modena and Reggio Emilia, Italy.

Editorial Responsibilities

Associate Editor

- 2023–** IEEE Open Journal of Instrumentation and Measurement
- 2020–** IEEE Transactions on Industrial Informatics

Editorial Board Member

- 2018—**
 - Journal of System Architecture, Elsevier, ISSN 1434-8411
 - MDPI Sensors, ISSN 1424-8220
 - International Journal of Computers and Applications, Taylor and Francis, ISSN 1434-8411
 - Wireless Communication and Mobile Computing, Wiley/Hindawi, ISSN 1530-8677

Guest Editor of Special Section/Issue

- 2021–2023** Special Issue “Recent Advances in Sensor Networks and Industrial IoT Technologies”
MDPI Sensors
Co-Guest Editors: Aamir Mahmood (MDU, Sweden), Tommaso Fedullo (Univ. Padova) and Alberto Morato (CNR-IEIT, Italy)

- 2019–2021** Corresponding Guest Editor – Special Section “Industrial Cyber-Physical Systems: new trends in computing and communications”
IEEE Transactions on Industrial Informatics
Co-Guest Editors: Michele Luvisotto (ABB Corporate Research, Sweden), Andreas Willig (Univ. Canterbury, NZ), Kan Yu (La Trobe University, AU)
- Reviewer for International Journals** IEEE Transactions on Instrumentation and Measurement, IEEE Sensors Journal, IEEE Transactions on Industrial Informatics, IEEE Industrial Electronic Magazine, IEEE Internet of Things Journal, IEEE Wireless Communication Letters, IEEE Communication Letters, Elsevier Computer Standard and Interfaces, Elsevier Ad-Hoc Networks, MDPI Sensors, IET Journal on Intelligent Transport Systems

International Awards and Affiliation to International Societies

- 2016 Best Paper Award**, *12th IEEE World Conference on Factory Communication Systems, WFCS 2016*, IEEE, May 3-6, 2016.
Aveiro, Portugal
- 2015 IEEE Transactions on Instrumentation and Measurement Outstanding Reviewer**, *IEEE Instrumentation and Measurement Society, in appreciation of outstanding service to the Transactions.*
- 2014 IEEE Transactions on Instrumentation and Measurement Outstanding Reviewer**, *IEEE Instrumentation and Measurement Society, in appreciation of outstanding service to the Transactions.*
- 2012 Appointed as Research Associate**, *Institute of Electronics, Computer and Telecommunication Engineering (CNR-IEIT)*, Torino.
National Research Council of Italy
- 2010 Best 2010 Conference Paper Award**, *Industrial Electronic Society, IEEE*, Appointed as the best conference paper presented in 2009/2010 to IES sponsored conferences.
Phoenix (AZ), USA
- 2009 James C. Hung Best Paper Award**, *14th International IEEE Conference on Emerging Technologies and Factory Automation*, IEEE ETFA 2009.
Palma de Mallorca, Spain

Membership in International Societies and Technical Committees

- IEEE IMS TC37** Member of IEEE-IMS Technical Committee on Measurements and Networking
- IEEE TCFA** Member of the IEEE-IES Technical Committee on Factory Automation (TCFA 1)
- IEEE TCII** Member of the IEEE-IES Technical Committee on Industrial Informatics
- Standard Development Committees** Member of the IEEE Working Group for the development of the standar “IEEE 61158 Standard for Industrial Hard Real-Time Communication”

Responsibility for scientific studies and research assigned by qualified public or private institutions

- 2018** Research Contract between University of Padova and CMZ Srl.
Analysis of innovative systems for interoperability and advanced connectivity to be applied to embedded systems for automation and distributed measurements in industry based on OPC UA
- 2017** Scientific Co-Responsible, Research Contract, between CNR-IEIT and Enerspin Srl.
February 2017
Development and implementation of an embedded system for the assessment and validation of data integrity in rotary distributors for industrial applications.
- 2016** Research Contract between the CNR-IEIT and KBlue Srl
Protocol no. IEIT 1090 – 27/07/2016
Within the field of domotic systems, performance analysis of distributed systems based on powerline interconnections.
- 2016** Research Contract between the CNR-IEIT and MC Elettronica Srl
Protocol no. IEIT 1091 – 27/07/2016
Research and implementation of an embedded system for remote control and supervision of machinery in agriculture with wireless IEEE 802.11g based systems.

Papers published in International Journals (JCR)

- [J1] A. Morato, S. Vitturi, F. Tramarin, C. Zunino, and M. Cheminod, "Time-sensitive networking to improve the performance of distributed functional safety systems implemented over wi-fi," *Sensors*, vol. 23, no. 18, 2023. DOI: 10.3390/s23187825. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85172737419&doi=10.3390%2fs23187825&partnerID=40&md5=f8f68920d46a12c33d09e24f74133d00>.
- [J2] A. Amidei, S. Spinsante, G. Iadarola, et al., "Driver drowsiness detection: A machine learning approach on skin conductance," *Sensors*, vol. 23, no. 8, 2023. DOI: 10.3390/s23084004. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85153946285&doi=10.3390%2fs23084004&partnerID=40&md5=08c29283b97e925b756b2cfcadc8f9b2>.
- [J3] A. Morato, T. Fedullo, S. Vitturi, L. Rovati, and F. Tramarin, "A learning model for battery lifetime prediction of lora sensors in additive manufacturing," *Acta IMEKO*, vol. 12, no. 1, 2023. DOI: 10.21014/ACTAIMEKO.V12I1.1400. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85153503596&doi=10.21014%2fACTAIMEKO.V12I1.1400&partnerID=40&md5=bb5d6f5e39fe9e1718d09c2a897d6835>.
- [J4] S. Spinsante, G. Iadarola, A. Paglialonga, and F. Tramarin, "Preface," *Lecture Notes of the Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering, LNICST*, vol. 456 LNICST, p. VI, 2023. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85151082507&partnerID=40&md5=248b5d5f0dc8708e434f7dfac1bda88d>.
- [J5] A. Poli, A. Amidei, S. Benatti, et al., "Exploiting blood volume pulse and skin conductance for driver drowsiness detection," *Lecture Notes of the Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering, LNICST*, vol. 456 LNICST, pp. 50–61, 2023. DOI: 10.1007/978-3-031-28663-6_5. [Online]. Available: https://www.scopus.com/inward/record.uri?eid=2-s2.0-85151058802&doi=10.1007%2f978-3-031-28663-6_5&partnerID=40&md5=ad9cbcd6d96c29a646a04c94baa5d11.
- [J6] V. Di Pinto, F. Tramarin, and L. Rovati, "A preliminary prototype of smart healthcare modular system for cardiovascular diseases remote monitoring," *Lecture Notes of the Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering, LNICST*, vol. 456 LNICST, pp. 93–107, 2023. DOI: 10.1007/978-3-031-28663-6_8. [Online]. Available: https://www.scopus.com/inward/record.uri?eid=2-s2.0-85151046297&doi=10.1007%2f978-3-031-28663-6_8&partnerID=40&md5=cc5547e3d686dfbac5963e6f787dac06.
- [J7] T. Fedullo, A. Morato, G. Peserico, et al., "An iot measurement system based on lorawan for additive manufacturing," *Sensors*, vol. 22, no. 15, 2022. DOI: 10.3390/s22155466. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85135203036&doi=10.3390%2fs22155466&partnerID=40&md5=e8fa6398728e58226c965f9a241058ce>.
- [J8] F. Branz, R. Antonello, M. Pezzutto, S. Vitturi, F. Tramarin, and L. Schenato, "Drive-by-wi-fi: Model-based control over wireless at 1 khz," *IEEE Transactions on Control Systems Technology*, vol. 30, no. 3, pp. 1078–1089, 2022. DOI: 10.1109/TCST.2021.3094865. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85112625292&doi=10.1109%2fTCST.2021.3094865&partnerID=40&md5=5460a5642f97cf94b85663ed9aed0b1c>.
- [J9] T. Fedullo, A. Morato, F. Tramarin, L. Rovati, and S. Vitturi, "A comprehensive review on time sensitive networks with a special focus on its applicability to industrial smart and distributed measurement systems," *Sensors*, vol. 22, no. 4, 2022. DOI: 10.3390/s22041638. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85124898708&doi=10.3390%2fs22041638&partnerID=40&md5=67cca748e91c5706ec6568b2ab249035>.
- [J10] T. Fedullo, D. Cassanelli, G. Gibertoni, et al., "Assessment of a vision-based technique for an automatic van herick measurement system," *IEEE Transactions on Instrumentation and Measurement*, vol. 71, 2022. DOI: 10.1109/TIM.2022.3196323. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85135766113&doi=10.1109%2fTIM.2022.3196323&partnerID=40&md5=3e08050492ea9a48e42af2e6af3643ae>.
- [J11] G. Peserico, A. Morato, F. Tramarin, and S. Vitturi, "Functional safety networks and protocols in the industrial internet of things era," *Sensors*, vol. 21, no. 18, 2021. DOI: 10.3390/s21186073. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85114493772&doi=10.3390%2fs21186073&partnerID=40&md5=cae59f5d4fb6c89b5c995bc016ca5d6b>.
- [J12] F. Tramarin, M. Luvisotto, A. Willig, and K. Yu, "Guest editorial: Industrial cyber-physical systems - new trends in computing and communications," *IEEE Transactions on Industrial Informatics*, vol. 17, no. 5, pp. 3518–3522, 2021. DOI: 10.1109/TII.2020.3033818. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85101772945&doi=10.1109%2fTII.2020.3033818&partnerID=40&md5=c951620c85285c149eaea1d7c8f413e6>.
- [J13] A. Morato, S. Vitturi, F. Tramarin, and A. Cenedese, "Assessment of different opc ua implementations for industrial iot-based measurement applications," *IEEE Transactions on Instrumentation and Measurement*, vol. 70, 2021. DOI: 10.1109/TIM.2020.3043116. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85097935631&doi=10.1109%2fTIM.2020.3043116&partnerID=40&md5=af0cd0e895e1f962a0242c98b4c6c78b>.

- [J14] F. Branz, R. Antonello, L. Schenato, F. Tramarin, and S. Vitturi, "Time-critical wireless networked embedded systems: Feasibility and experimental assessment," *IEEE Transactions on Industrial Informatics*, vol. 16, no. 12, pp. 7732–7742, 2020. DOI: 10.1109/TII.2020.2992990. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85092076600&doi=10.1109%2fTII.2020.2992990&partnerID=40&md5=1cdf600d86f15df174c48a3c7fbadb5c>.
- [J15] T. Fedullo, F. Tramarin, and S. Vitturi, "The impact of rate adaptation algorithms on wi-fi-based factory automation systems," *Sensors (Switzerland)*, vol. 20, no. 18, pp. 1–13, 2020. DOI: 10.3390/s20185195. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85090575123&doi=10.3390%2fs20185195&partnerID=40&md5=b15114cff2f1643b37fbb4a490de2cc8>.
- [J16] M. Pezzutto, F. Tramarin, S. Dey, and L. Schenato, "Adaptive transmission rate for lqg control over wi-fi: A cross-layer approach," *Automatica*, vol. 119, 2020. DOI: 10.1016/j.automatica.2020.109092. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85086632897&doi=10.1016%2fj.automatica.2020.109092&partnerID=40&md5=79afc58f5f9cc54ee58e10865e0f66a8>.
- [J17] F. Tramarin, A. Mok, and S. Han, "Real-time and reliable industrial control over wireless lans: Algorithms, protocols, and future directions," *Proceedings of the IEEE*, vol. 107, no. 6, pp. 1027–1052, 2019. DOI: 10.1109/JPROC.2019.2913450. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85066504055&doi=10.1109%2fJPROC.2019.2913450&partnerID=40&md5=1ca52583278f3988a7533a41a25577f3>.
- [J18] F. Tramarin, C. Narduzzi, S. Vitturi, and M. Bertocco, "A calibrated test-set for measurement of access-point time specifications in hybrid wired/wireless industrial communication," *Information (Switzerland)*, vol. 9, no. 5, 2018. DOI: 10.3390/info9050122. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85047153861&doi=10.3390%2finfo9050122&partnerID=40&md5=3af0e1883e3afb05ae9432a0aa0bd93c>.
- [J19] M. Luvisotto, F. Tramarin, L. Vangelista, and S. Vitturi, "On the use of lorawan for indoor industrial iot applications," *Wireless Communications and Mobile Computing*, vol. 2018, 2018. DOI: 10.1155/2018/3982646. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85047876057&doi=10.1155%2f2018%2f3982646&partnerID=40&md5=f20121238b39575c9b73eefd94b0668d>.
- [J20] M. Luvisotto, F. Tramarin, and S. Vitturi, "A learning algorithm for rate selection in real-time wireless lans," *Computer Networks*, vol. 126, pp. 114–124, 2017. DOI: 10.1016/j.comnet.2017.07.002. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85022196686&doi=10.1016%2fj.comnet.2017.07.002&partnerID=40&md5=8eb77f8edfe1551ed19135551a17672f>.
- [J21] F. Tramarin, S. Vitturi, and M. Luvisotto, "A dynamic rate selection algorithm for ieee 802.11 industrial wireless lan," *IEEE Transactions on Industrial Informatics*, vol. 13, no. 2, pp. 846–855, 2017. DOI: 10.1109/TII.2016.2616327. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85018190214&doi=10.1109%2fTII.2016.2616327&partnerID=40&md5=48c11e8c153aeb86fdb3e20a9f75b08d>.
- [J22] A. Cenedese, F. Tramarin, and S. Vitturi, "An energy efficient ethernet strategy based on traffic prediction and shaping," *IEEE Transactions on Communications*, vol. 65, no. 1, pp. 270–282, 2017. DOI: 10.1109/TCOMM.2016.2623702. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85009917903&doi=10.1109%2fTCOMM.2016.2623702&partnerID=40&md5=f45d68653edc8a732c84bbfd5b8bc611>.
- [J23] F. Tramarin, S. Vitturi, M. Luvisotto, and A. Zanella, "On the use of ieee 802.11n for industrial communications," *IEEE Transactions on Industrial Informatics*, vol. 12, no. 5, pp. 1877–1886, 2016. DOI: 10.1109/TII.2015.2504872. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85012045392&doi=10.1109%2fTII.2015.2504872&partnerID=40&md5=9c18daf384c1d24c6345bc8fd7eb9251>.
- [J24] F. Tramarin and S. Vitturi, "Strategies and services for energy efficiency in real-time ethernet networks," *IEEE Transactions on Industrial Informatics*, vol. 11, no. 3, pp. 841–852, 2015. DOI: 10.1109/TII.2015.2426953. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84937391024&doi=10.1109%2fTII.2015.2426953&partnerID=40&md5=cea5bcab905b8420b74d19d0e6c4d0d4>.
- [J25] S. Vitturi and F. Tramarin, "Energy efficient ethernet for real-time industrial networks," *IEEE Transactions on Automation Science and Engineering*, vol. 12, no. 1, pp. 228–237, 2015. DOI: 10.1109/TASE.2014.2313735. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84920833475&doi=10.1109%2fTASE.2014.2313735&partnerID=40&md5=a28b6c444836aae6419b64f7980481ab>.
- [J26] M. Bertocco, G. Frigo, C. Narduzzi, and F. Tramarin, "Resolution enhancement by compressive sensing in power quality and phasor measurement," *IEEE Transactions on Instrumentation and Measurement*, vol. 63, no. 10, pp. 2358–2367, 2014. DOI: 10.1109/TIM.2014.2321465. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84907536752&doi=10.1109%2fTIM.2014.2321465&partnerID=40&md5=1f6b497ddf60da698d893d708c7d91d0>.
- [J27] S. Vitturi, L. Seno, F. Tramarin, and M. Bertocco, "On the rate adaptation techniques of ieee 802.11 networks for industrial applications," *IEEE Transactions on Industrial Informatics*, vol. 9, no. 1, pp. 198–208, 2013. DOI: 10.1109/TII.2012.2189223. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84871745083&doi=10.1109%2fTII.2012.2189223&partnerID=40&md5=1b6c3380cfe8cce2b8ac1113b37815df>.

- [J28] S. Vitturi, F. Tramarin, and L. Seno, "Industrial wireless networks: The significance of timeliness in communication systems," *IEEE Industrial Electronics Magazine*, vol. 7, no. 2, pp. 40–51, 2013. DOI: 10.1109/MIE.2013.2253837. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84879919383&doi=10.1109%2fMIE.2013.2253837&partnerID=40&md5=4d043e0df19db59a70963083e9bf5de8>.
- [J29] L. Seno, F. Tramarin, and S. Vitturi, "Performance of industrial communication systems: Real application contexts," *IEEE Industrial Electronics Magazine*, vol. 6, no. 2, pp. 27–37, 2012. DOI: 10.1109/MIE.2012.2193292. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84862701828&doi=10.1109%2fMIE.2012.2193292&partnerID=40&md5=99b02bf0a8cd859b1bda30f0b0c44791>.
- [J30] G. Gamba, F. Tramarin, and A. Willig, "Retransmission strategies for cyclic polling over wireless channels in the presence of interference," *IEEE Transactions on Industrial Informatics*, vol. 6, no. 3, pp. 405–415, 2010. DOI: 10.1109/TII.2010.2050777. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-77955714345&doi=10.1109%2fTII.2010.2050777&partnerID=40&md5=abc5a0dbb81471c120561f85c9cd8b99>.

Chapters in Books

- [B1] F. Tramarin and S. Vitturi, "Ethernet powerlink," in 2017, pp. 19-1-19-12. DOI: 10.1201/b17365. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85051780391&doi=10.1201%2fb17365&partnerID=40&md5=ed2cda4096fe5af993677b2ad550305d>.
- [B2] E. Sisinni and F. Tramarin, "Isochronous wireless communication system for industrial automation," in 2016, pp. 167–188. DOI: 10.1016/B978-1-78242-230-3.00009-X. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84982794759&doi=10.1016%2fB978-1-78242-230-3.00009-X&partnerID=40&md5=f5a2e16b2ebe8fe8551fa3c610635793>.

Papers published in International Conference Proceedings

- [C1] A. Morato, G. Frigo, and F. Tramarin, "Optimized 5g communication infrastructure for pmu-based distributed measurement systems," 2023. DOI: 10.1109/AMPS59207.2023.10297144. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85178048042&doi=10.1109%2fAMPS59207.2023.10297144&partnerID=40&md5=d81677c3721aa26cbd747ffcf4167388>.
- [C2] A. Morato, C. Zunino, M. Cheminod, *et al.*, "Evaluating the integration of wireless time-sensitive networking with software-defined networking for dynamic network configuration," vol. 2023-September, 2023. DOI: 10.1109/ETFA54631.2023.10275548. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85172721552&doi=10.1109%2fETFA54631.2023.10275548&partnerID=40&md5=f0f4b1c3d8e23f8ae0961675a>.
- [C3] S. Sudhakaran, C. Hall, D. Cavalcanti, A. Morato, C. Zunino, and F. Tramarin, "Measurement method for end-to-end time synchronization of wired and wireless tsn," vol. 2023-May, 2023. DOI: 10.1109/I2MTC53148.2023.10176093. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85166376717&doi=10.1109%2fI2MTC53148.2023.10176093&partnerID=40&md5=ba5ae47158ed7f2b148d38ba676f6b9b>.
- [C4] T. Fedullo, A. Mahmood, F. Tramarin, A. Morato, M. Gidlund, and L. Rovati, "Exploiting hybrid medium access control and relaying strategies to overcome duty-cycle limitations in lora-based sensor networks," vol. 2023-May, 2023. DOI: 10.1109/I2MTC53148.2023.10176039. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85166367368&doi=10.1109%2fI2MTC53148.2023.10176039&partnerID=40&md5=f1a0f3e1db6d48e9c2eb03c257ff5bfb>.
- [C5] G. Frigo, A. Morato, T. Fedullo, and F. Tramarin, "Iec 61850 on 5g communication infrastructure: Feasibility analysis and practical considerations," vol. 2023-May, 2023. DOI: 10.1109/I2MTC53148.2023.10175967. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85166366835&doi=10.1109%2fI2MTC53148.2023.10175967&partnerID=40&md5=7c09e0e547967387349ecf2e22335ac3>.
- [C6] V. Di Pinto, F. Tramarin, and L. Rovati, "Health status remote monitoring system: Ecg peaks detection by successive thresholding algorithm employing envelope function," vol. 2023-May, 2023. DOI: 10.1109/I2MTC53148.2023.10176007. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85166365790&doi=10.1109%2fI2MTC53148.2023.10176007&partnerID=40&md5=275855656ce2dadedf38ccf8dfc55740c>.
- [C7] D. Cassanelli, G. Gibertoni, M. Ferrazza, *et al.*, "Image analysis algorithm for the anterior chamber angle closure estimation and van herick classification," 2023, pp. 267–272. DOI: 10.1109/IWASI58316.2023.10164450. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85165734829&doi=10.1109%2fIWASI58316.2023.10164450&partnerID=40&md5=a28335634220819f9833b4378b2d1e71>.
- [C8] T. Fedullo, V. Pinto, A. Morato, F. Tramarin, S. Cattini, and L. Rovati, "On the use of artificial intelligence and sensor fusion to develop accurate eye tracking and driver's emotional state estimation systems," 2022, pp. 116–121. DOI: 10.1109/MetroAutomotive54295.2022.9855021. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85137175830&doi=10.1109%2fMetroAutomotive54295.2022.9855021&partnerID=40&md5=c44a6fb6071c1010fa82f12de11fbee1>.
- [C9] T. Fedullo, A. Morato, F. Tramarin, S. Cattini, and L. Rovati, "Artificial intelligence - based measurement systems for automotive: A comprehensive review," 2022, pp. 122–127. DOI: 10.1109/MetroAutomotive54295.2022.9855154. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85137175299&doi=10.1109%2fMetroAutomotive54295.2022.9855154&partnerID=40&md5=3146c855f6bd6b2ad5ede2cb9410c1a9>.

- [C10] A. Amidei, A. Poli, G. Iadarola, *et al.*, “Driver drowsiness detection based on variation of skin conductance from wearable device,” 2022, pp. 94–98. DOI: 10.1109/MetroAutomotive54295.2022.9854871. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85137173382&doi=10.1109%2fMetroAutomotive54295.2022.9854871&partnerID=40&md5=a128562cb3ed2eb19f686a4491560bf6>.
- [C11] T. Fedullo, A. Morato, F. Tramarin, P. Ferrari, and E. Sisinni, “Smart measurement systems exploiting adaptive lorawan under power consumption constraints: A rl approach,” 2022, pp. 354–359. DOI: 10.1109/MetroInd4.0IoT54413.2022.9831487. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85136120578&doi=10.1109%2fMetroInd4.0IoT54413.2022.9831487&partnerID=40&md5=9dec8efd2a5a40f49149f0a4d5355ed6>.
- [C12] G. Peserico, T. Fedullo, A. Morato, F. Tramarin, and S. Vitturi, “Ultra-wideband for distance measurement and positioning in functional safety applications,” 2022, pp. 360–365. DOI: 10.1109/MetroInd4.0IoT54413.2022.9831662. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85136099220&doi=10.1109%2fMetroInd4.0IoT54413.2022.9831662&partnerID=40&md5=0767fc78f72c0dc52558cddb97f5ee17>.
- [C13] T. Fedullo, E. Masetti, G. Gibertoni, F. Tramarin, and L. Rovati, “On the use of an hyperspectral imaging vision based measurement system and machine learning for iris pigmentation grading,” 2022. DOI: 10.1109/I2MTC48687.2022.9806509. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85134432238&doi=10.1109%2fI2MTC48687.2022.9806509&partnerID=40&md5=491f40a66dd6c8a8a97f66b722a8a902>.
- [C14] D. Cassanelli, T. Fedullo, G. Gibertoni, *et al.*, “Training of an artificial intelligence algorithm for automatic detection of the van herick grade,” vol. 11941, 2022. DOI: 10.1117/12.2607610. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85131206295&doi=10.1117%2f12.2607610&partnerID=40&md5=70d50241275f0b550f8bdd96ceed840a>.
- [C15] G. Gibertoni, V. Di Pinto, S. Cattini, F. Tramarin, M. Geiser, and L. Rovati, “A simple maxwellian optical system to investigate the photoreceptors contribution to pupillary light reflex,” vol. 11941, 2022. DOI: 10.1117/12.2608129. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85131169326&doi=10.1117%2f12.2608129&partnerID=40&md5=3a04306de1b1d98bda5af978894bcd1c>.
- [C16] L. Peretto, L. Rovati, R. Tinarelli, S. Cattini, F. Tramarin, and R. Di Sante, “Welcome message from the workshop chairs,” 2021. DOI: 10.1109/MetroAutomotive50197.2021.9502876. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85114989125&doi=10.1109%2fMetroAutomotive50197.2021.9502876&partnerID=40&md5=cea7a9ed8c3071f6eb6371a11bbb1012>.
- [C17] T. Fedullo, A. Morato, F. Tramarin, P. Bellagente, P. Ferrari, and E. Sisinni, “Adaptive lorawan transmission exploiting reinforcement learning: The industrial case,” 2021, pp. 671–676. DOI: 10.1109/MetroInd4.0IoT51437.2021.9488498. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85112035319&doi=10.1109%2fMetroInd4.0IoT51437.2021.9488498&partnerID=40&md5=7c7fe80c287ffe43e01cfd4da3b37e>.
- [C18] T. Fedullo, D. Cassanelli, G. Gibertoni, *et al.*, “A machine learning approach for a vision-based van-herick measurement system,” vol. 2021-May, 2021. DOI: 10.1109/I2MTC50364.2021.9459946. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85113715753&doi=10.1109%2fI2MTC50364.2021.9459946&partnerID=40&md5=696f5e628392970d4d887dd325fe5af8>.
- [C19] G. Peserico, T. Fedullo, A. Morato, F. Tramarin, L. Rovati, and S. Vitturi, “Snr-based reinforcement learning rate adaptation for time critical wi-fi networks: Assessment through a calibrated simulator,” vol. 2021-May, 2021. DOI: 10.1109/I2MTC50364.2021.9460075. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85113712918&doi=10.1109%2fI2MTC50364.2021.9460075&partnerID=40&md5=380239d3c9b3731c5d628110117a2e66>.
- [C20] A. Morato, G. Peserico, T. Fedullo, F. Tramarin, and S. Vitturi, “Tuning of a simulation model for the assessment of functional safety over wi-fi,” vol. 2021-July, 2021. DOI: 10.1109/INDIN45523.2021.9557469. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85125571470&doi=10.1109%2fINDIN45523.2021.9557469&partnerID=40&md5=db536e0b21772d76b69b8d72b33dd7b5>.
- [C21] G. Peserico, T. Fedullo, A. Morato, F. Tramarin, and S. Vitturi, “Wi-fi based functional safety: An assessment of the fail safe over ethercat (fsoe) protocol,” vol. 2021-September, 2021. DOI: 10.1109/ETFA45728.2021.9613166. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85122966643&doi=10.1109%2fETFA45728.2021.9613166&partnerID=40&md5=9c2dc4b7e6b9bbad8df99efb37cdff1a>.
- [C22] A. Morato, S. Vitturi, T. Fedullo, G. Peserico, and F. Tramarin, “A profinet simulator for the digital twin of networked electrical drive systems,” vol. 2020-September, 2020, pp. 1099–1102. DOI: 10.1109/ETFA46521.2020.9212017. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85093364976&doi=10.1109%2fETFA46521.2020.9212017&partnerID=40&md5=18cb48cb3b48319ba6878fa3b3c3cd2b>.
- [C23] L. Trevisan, S. Vitturi, F. Tramarin, and A. Morato, “An iiot system to monitor 3d-printed artifacts via lorawan embedded sensors,” vol. 2020-September, 2020, pp. 1331–1334. DOI: 10.1109/ETFA46521.2020.9212019. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85093364538&doi=10.1109%2fETFA46521.2020.9212019&partnerID=40&md5=1a272dc006cb255031cf60c43026ac2e>.

- [C24] G. Peserico, T. Fedullo, A. Morato, S. Vitturi, and F. Tramarin, "Rate adaptation by reinforcement learning for wi-fi industrial networks," vol. 2020-September, 2020, pp. 1139–1142. DOI: 10.1109/ETFA46521.2020.9212060. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85093361931&doi=10.1109%2fETFA46521.2020.9212060&partnerID=40&md5=80a0fb16f36552a831569535683c7e1b>.
- [C25] S. Vitturi, L. Trevisan, A. Morato, G. Frigo, and F. Tramarin, "Evaluation of lorawan for sensor data collection in an iiot-based additive manufacturing project," 2020. DOI: 10.1109/I2MTC43012.2020.9128684. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85088311104&doi=10.1109%2fI2MTC43012.2020.9128684&partnerID=40&md5=5589541737705dba78027a68d54fc4cd>.
- [C26] A. Morato, S. Vitturi, F. Tramarin, and A. Cenedese, "Assessment of different opc ua industrial iot solutions for distributed measurement applications," 2020. DOI: 10.1109/I2MTC43012.2020.9129474. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85088295009&doi=10.1109%2fI2MTC43012.2020.9129474&partnerID=40&md5=2e28bed949285132fbfbd340b47884dc>.
- [C27] F. Branz, R. Antonello, M. Pezzutto, F. Tramarin, and L. Schenato, "1 khz remote control of a balancing robot with wi-fi-in-the-loop," 2, vol. 53, 2020, pp. 2614–2619. DOI: 10.1016/j.ifacol.2020.12.312. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85105083761&doi=10.1016%2fj.ifacol.2020.12.312&partnerID=40&md5=ebf55d0d8fbf38c1aa527c3bf2dcd911>.
- [C28] A. Morato, S. Vitturi, A. Cenedese, G. Fadel, and F. Tramarin, "The fail safe over ethercat (fsoe) protocol implemented on the ieee 802.11 wlan," vol. 2019-September, 2019, pp. 1163–1170. DOI: 10.1109/ETFA.2019.8869503. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85074206431&doi=10.1109%2fETFA.2019.8869503&partnerID=40&md5=854f5ea8d3458b03bed1f27b73573818>.
- [C29] A. Cenedese, M. Frodella, F. Tramarin, and S. Vitturi, "Comparative assessment of different opc ua open-source stacks for embedded systems," vol. 2019-September, 2019, pp. 1127–1134. DOI: 10.1109/ETFA.2019.8869187. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85074198575&doi=10.1109%2fETFA.2019.8869187&partnerID=40&md5=c2be6d9568fc9fd5baaf2833e7e54057>.
- [C30] F. Branz, R. Antonello, F. Tramarin, T. Fedullo, S. Vitturi, and L. Schenato, "Embedded systems for time-critical applications over wi-fi: Design and experimental assessment," vol. 2019-July, 2019, pp. 1756–1759. DOI: 10.1109/INDIN41052.2019.8972168. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85079053403&doi=10.1109%2fINDIN41052.2019.8972168&partnerID=40&md5=c0176e9b388abdd21e233d2aa>.
- [C31] F. Branz, M. Pezzutto, R. Antonello, F. Tramarin, and L. Schenato, "Drive-by-wi-fi: Testing 1 khz control experiments over wireless," 2019, pp. 2990–2995. DOI: 10.23919/ECC.2019.8795706. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85071540734&doi=10.23919%2fECC.2019.8795706&partnerID=40&md5=7dea9f0e0da0fa00083a709d50ddd793>.
- [C32] F. Demrozi, V. Bragoi, F. Tramarin, and G. Pravadelli, "An indoor localization system to detect areas causing the freezing of gait in parkinsonians," 2019, pp. 952–955. DOI: 10.23919/DATE.2019.8715093. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85066629008&doi=10.23919%2fDATE.2019.8715093&partnerID=40&md5=9e68ec01a46b7aba1421b76d7989e74b>.
- [C33] M. Luvisotto, F. Tramarin, and S. Vitturi, "Assessing the impact of full-duplex wireless in real-time industrial networks," 2018, pp. 4119–4124. DOI: 10.1109/IECON.2018.8591554. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85061539718&doi=10.1109%2fIECON.2018.8591554&partnerID=40&md5=13f18374de3176ad99eef710e47620e8>.
- [C34] S. Vitturi, A. Morato, A. Cenedese, G. Fadel, F. Tramarin, and R. Fantinel, "An innovative algorithmic safety strategy for networked electrical drive systems," 2018, pp. 368–373. DOI: 10.1109/INDIN.2018.8472105. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85055569086&doi=10.1109%2fINDIN.2018.8472105&partnerID=40&md5=92cf0f648d0539fc4c12af8342f55bd9>.
- [C35] F. Tramarin, S. Vitturi, C. Zunino, and G. Frigo, "Characterization of electrical rotary distributors for real-time data communication," 2018, pp. 1–6. DOI: 10.1109/I2MTC.2018.8409846. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85050761947&doi=10.1109%2fI2MTC.2018.8409846&partnerID=40&md5=49caaa98607f9b492563e26edb8ec443>.
- [C36] F. Demrozi, K. Costa, F. Tramarin, and G. Pravadelli, "A graph-based approach for mobile localization exploiting real and virtual landmarks," vol. 2018-October, 2018, pp. 249–254. DOI: 10.1109/VLSI-SoC.2018.8644877. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85063030197&doi=10.1109%2fVLSI-SoC.2018.8644877&partnerID=40&md5=690bd65d7d38505a7f2a3542da912e23>.
- [C37] M. Pezzutto, F. Tramarin, S. Dey, and L. Schenato, "Snr-triggered communication rate for lqg control over wi-fi," vol. 2018-December, 2018, pp. 1725–1730. DOI: 10.1109/CDC.2018.8618999. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85062187753&doi=10.1109%2fCDC.2018.8618999&partnerID=40&md5=4f6cd1138bc246adf6dc85e373b7e1ce>.
- [C38] M. Luvisotto, A. Tagliapietra, S. Romagnolo, F. Tramarin, and S. Vitturi, "Real-time wireless extensions of industrial ethernet networks," 2017, pp. 363–368. DOI: 10.1109/INDIN.2017.8104799. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85041173017&doi=10.1109%2fINDIN.2017.8104799&partnerID=40&md5=95360c6655fcf109a88a1d1f81fc55e5>.

- [C39] A. Flammini, E. Sisinni, and F. Tramarin, "Ieee 802.11s performance assessment: From simulations to real-world experiments," 2017. DOI: 10.1109/I2MTC.2017.7969752. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85026758007&doi=10.1109%2fI2MTC.2017.7969752&partnerID=40&md5=57e43423b3ca0c23f791d872a3e2790b>.
- [C40] F. Tramarin, S. Vitturi, and M. Luvisotto, "Ieee 802.11n for distributed measurement systems," 2017. DOI: 10.1109/I2MTC.2017.7969670. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85026724782&doi=10.1109%2fI2MTC.2017.7969670&partnerID=40&md5=dfce3466ddb4ba5d0f1aa7b868b0a5cc>.
- [C41] F. Tramarin, S. Vitturi, and M. Luvisotto, "Performance analysis of ieee 802.11 rate selection for industrial networks," 2016, pp. 4689–4694. DOI: 10.1109/IECON.2016.7794033. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-85010036648&doi=10.1109%2fIECON.2016.7794033&partnerID=40&md5=88dbc848a3a1ab5f2d6ec5fc6eb8d72d>.
- [C42] F. Tramarin, S. Vitturi, and M. Luvisotto, "An innovative approach to rate adaptation in ieee 802.11 real-time industrial networks," vol. 2016-June, 2016. DOI: 10.1109/WFCS.2016.7496498. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84982851853&doi=10.1109%2fWFCS.2016.7496498&partnerID=40&md5=e9c2bb9a0dc497b1df1e7bcbddaf659e>.
- [C43] F. Tramarin, S. Vitturi, and M. Luvisotto, "Improved rate adaptation strategies for real-time industrial ieee 802.11n w lans," vol. 2015-October, 2015. DOI: 10.1109/ETFA.2015.7301481. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84952930305&doi=10.1109%2fETFA.2015.7301481&partnerID=40&md5=0ac57ac8facb782d7886e898e97c0966>.
- [C44] F. Tramarin, S. Vitturi, and M. Luvisotto, "Enhancing the real-time behavior of ieee 802.11n," vol. 2015-July, 2015. DOI: 10.1109/WFCS.2015.7160580. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84942288070&doi=10.1109%2fWFCS.2015.7160580&partnerID=40&md5=cee1ebb6ea6386dbb10564636f02>.
- [C45] F. Tramarin, S. Vitturi, M. Luvisotto, and A. Zanella, "The ieee 802.11n wireless lan for real-time industrial communication," vol. 2015-July, 2015. DOI: 10.1109/WFCS.2015.7160568. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84942284271&doi=10.1109%2fWFCS.2015.7160568&partnerID=40&md5=f6b8031d56b6ce758d2d384f574b5ff>.
- [C46] F. Tramarin, S. Vitturi, M. Luvisotto, and R. Parrozzani, "Performance assessment of an ieee 802.11-based protocol for real-time communication in agriculture," 2014. DOI: 10.1109/ETFA.2014.7005304. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84946692784&doi=10.1109%2fETFA.2014.7005304&partnerID=40&md5=66f0180081e000305ce119acccfd77>.
- [C47] A. Ballarino, A. Brusafferri, M. Cereia, *et al.*, "System-level performance of an automation solution based on industry standards," 2014. DOI: 10.1109/ETFA.2014.7005350. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84946692068&doi=10.1109%2fETFA.2014.7005350&partnerID=40&md5=50ac2c3302846297e3052d65c96857d8>.
- [C48] A. Cenedese, M. Michielan, F. Tramarin, and S. Vitturi, "An energy efficient traffic shaping algorithm for ethernet-based multimedia industrial traffic," 2014. DOI: 10.1109/ETFA.2014.7005278. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84946685479&doi=10.1109%2fETFA.2014.7005278&partnerID=40&md5=736c06d6e9cb65394524aa78ac34aa21>.
- [C49] F. Tramarin and S. Vitturi, "Energy efficient ethernet for the industrial communication scenario," 2013. DOI: 10.1109/ETFA.2013.6648042. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84890713463&doi=10.1109%2fETFA.2013.6648042&partnerID=40&md5=2a7c71db5eca68c349b485680f570e7c>.
- [C50] F. Tramarin and S. Vitturi, "Performance analysis of ieee 802.11g multi-rate support for industrial applications," 2013, pp. 5605–5610. DOI: 10.1109/IECON.2013.6700052. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84893571769&doi=10.1109%2fIECON.2013.6700052&partnerID=40&md5=6e9b476f9cbec235ccdc46ff4d411e2f>.
- [C51] M. Bertocco, C. Narduzzi, F. Tramarin, L. Seno, and S. Vitturi, "Estimation and analysis of communication service time in a real-time wireless industrial network," 2013, pp. 1838–1843. DOI: 10.1109/I2MTC.2013.6555732. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84882264325&doi=10.1109%2fI2MTC.2013.6555732&partnerID=40&md5=c1013081a3c738a8d4fe48f4e4b47b60>.
- [C52] M. Bertocco, C. Narduzzi, and F. Tramarin, "Characterization of microgrid smart metering: Phasor estimation under impaired conditions," 2013, pp. 1170–1175. DOI: 10.1109/I2MTC.2013.6555598. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84882256592&doi=10.1109%2fI2MTC.2013.6555598&partnerID=40&md5=9ff909f53a657ee541d45cfaacf534f6>.
- [C53] M. Bertocco, G. Frigo, C. Narduzzi, and F. Tramarin, "Resolution enhancement in harmonic analysis by compressive sensing," 2013, pp. 40–45. DOI: 10.1109/amps.2013.6656223. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84890293247&doi=10.1109%2famps.2013.6656223&partnerID=40&md5=cd2707a4b9f04aa42a273658f2dc0a2f>.

- [C54] M. Bertocco and F. Tramarin, "A system architecture for distributed monitoring and control in a smart microgrid," 2012, pp. 24–31. DOI: 10.1109/EESMS.2012.6348396. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84870844288&doi=10.1109%2fEESMS.2012.6348396&partnerID=40&md5=3d3121bab70bf515785648552e15398d>.
- [C55] L. Seno, S. Vitturi, and F. Tramarin, "Tuning of ieee 802.11 mac for improving real-time in industrial wireless networks," 2012. DOI: 10.1109/ETFA.2012.6489553. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84876364013&doi=10.1109%2fETFA.2012.6489553&partnerID=40&md5=03507957de6fb35cd1a1d28cfecb0d6f>.
- [C56] M. Bertocco, C. Narduzzi, and F. Tramarin, "Estimation of the delay of network devices in hybrid wired/wireless real-time industrial communication systems," 2012, pp. 2016–2021. DOI: 10.1109/I2MTC.2012.6229137. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84864253531&doi=10.1109%2fI2MTC.2012.6229137&partnerID=40&md5=115621617b627d44293948f9df505d1b>.
- [C57] M. Bertocco and F. Tramarin, "A cross-layer simulator for industrial wireless communication systems," 2011, pp. 83–88. DOI: 10.1109/IWMN.2011.6088484. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-83755196673&doi=10.1109%2fIWMN.2011.6088484&partnerID=40&md5=6013d63c0623761e641c8dc49b95f83c>.
- [C58] M. Bertocco, F. Tramarin, A. Sona, and T. Dal Canton, "A calibration method for planar inductors in emc filters: Analysis and experimental validation," 2011, pp. 316–321. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-83155191140&partnerID=40&md5=c628a318945db61d614ca599b4a88d39>.
- [C59] M. Bertocco, G. Giorgi, C. Narduzzi, and F. Tramarin, "A case for ieee std. 1451 in smart microgrid environments," 2011, pp. 124–129. DOI: 10.1109/SMFG.2011.6125777. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-84856351238&doi=10.1109%2fSMFG.2011.6125777&partnerID=40&md5=4876e17eb9fd0e04293af7cca0c48e69>.
- [C60] L. Seno, S. Vitturi, and F. Tramarin, "Experimental evaluation of the service time for industrial hybrid (wired/wireless) networks under non-ideal environmental conditions," 2011. DOI: 10.1109/ETFA.2011.6059005. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-80655131976&doi=10.1109%2fETFA.2011.6059005&partnerID=40&md5=bf065af6d038608891ebb49d2396e83d>.
- [C61] L. Seno, S. Vitturi, and F. Tramarin, "Influence of real components behavior on the performance of wireless industrial communication systems," 2011, pp. 1224–1229. DOI: 10.1109/ISIE.2011.5984333. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-80052841098&doi=10.1109%2fISIE.2011.5984333&partnerID=40&md5=b7bd7cd6d704d1627bb3a9c355d306fa>.
- [C62] M. Bertocco, A. Sona, and F. Tramarin, "Design of experiments for the assessment of coexistence between wireless networks," 2010, pp. 928–932. DOI: 10.1109/IMTC.2010.5488053. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-77957833427&doi=10.1109%2fIMTC.2010.5488053&partnerID=40&md5=a7e80b3915c29550501cf2e1396dba0b>.
- [C63] G. Gamba, F. Tramarin, and A. Willig, "Retransmission strategies for cyclic polling over wireless channels in the presence of interference," 2009. DOI: 10.1109/ETFA.2009.5347042. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-77949906493&doi=10.1109%2fETFA.2009.5347042&partnerID=40&md5=637b5e0a1592a029f669473685bb09af>.
- [C64] C. De Dominicis, P. Ferrari, A. Flammini, et al., "Investigating wireless coexistence issues through a specifically designed simulator," 2009, pp. 1085–1090. DOI: 10.1109/IMTC.2009.5168615. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-70449866071&doi=10.1109%2fIMTC.2009.5168615&partnerID=40&md5=b867994e5ae61f0ec15d0e9aa9330091>.
- [C65] M. Bertocco, G. Gamba, A. Sona, and F. Tramarin, "Investigating wireless networks coexistence issues through an interference aware simulator," 2008, pp. 1153–1156. DOI: 10.1109/ETFA.2008.4638543. [Online]. Available: <https://www.scopus.com/inward/record.uri?eid=2-s2.0-56349090933&doi=10.1109%2fETFA.2008.4638543&partnerID=40&md5=8bacfb14f3e1796e32c2eae9ad0bdef0>.

In compliance with the Italian legislative Decree no. 196 dated 30/06/2003, I hereby authorize you to use and process my personal details contained in this document.

Modena, April 29, 2024

Federico Tramarin

