

# AIELLO ORAZIO

## Overview

- ? Unit: ICT
- ? Role: Ricercatore
- ? Grade: Ricercatore t.d. art. 24 c. 3 lett. B Legge 240/10 (t.pieno) + 20%
- ? SSD: IINF-01/A (Elettronica)
- ? Scopus ID: 57212143527
- ? Unige Id: 717921
- ? Retrieved at: 2025-11-14T15:16:16.284201

## Contact

- ? Email: orazio.aiello@unige.it
- ? Page: <https://rubrica.unige.it/personale/UkJAUlh0>
- ? Locations: Opera Pia - padiglione D (ED161450401), 3° piano, US161450401.III.025

## Career

- ? Rd, 2021-12-01 ? 2026-02-28

## Teaching

### 2025

- ? Vlsi Circuit Design (114749), Lm-29 - Electronic Engineering
- ? Analog Electronics (114746), Lm-29 - Electronic Engineering
- ? Analog Electronics (114746), Lm-29 - Electronic Engineering

### 2024

- ? Vlsi Circuit Design (114749), Lm-29 - Electronic Engineering
- ? Analog Electronics (114746), Lm-29 - Electronic Engineering
- ? Analog Electronics (114746), Lm-29 - Electronic Engineering

### 2023

- ? Microelectronics (106786), Lm-29 - Ingegneria Elettronica
- ? Integrated Electronics (106772), Lm-29 - Ingegneria Elettronica
- ? Elementi Di Elettronica (107827), L-P03 - Tecnologie Industriali

### 2022

- ? Integrated Electronics (106772), Lm-29 - Ingegneria Elettronica
- ? Distributed Electronic Systems And Technologies For Environmental Monitoring (94631), Lm-26 - Engineering For Natural Risk Management

### 2021

- ? Distributed Electronic Systems And Technologies For Environmental Monitoring (94631), Lm-26 - Engineering For Natural Risk Management

## Scopus Metrics

- ? absolute; Docs: 86; Journals: 34; Conferences: 49; Citations: 956; H-index: 20
- ? 15 years (2010-2025); Docs: 84; Journals: 34; Conferences: 47; Citations: 952; H-index: 20
- ? 10 years (2015-2025); Docs: 77; Journals: 31; Conferences: 43; Citations: 873; H-index: 19
- ? 05 years (2020-2025); Docs: 59; Journals: 25; Conferences: 32; Citations: 505; H-index: 10

## Scopus Products

1.
  - ? Title: On Standard Cell-Based Design for Dynamic Voltage Comparators and Relaxation Oscillators
  - ? Venue: Chips
  - ? Year: 2025
  - ? Type: Journal
  - ? Subtype: Article
  - ? Citations: 0
  - ? DOI: 10.3390/chips4030031
  - ? Scopus ID: 2-s2.0-105017076146
  - ? eISSN: 26740729
  - ? Volume: 4
  - ? Issue: 3
  - ? Authors: Aiello Orazio
  - ? Keywords: dynamic leakage suppression logic | rail-to-rail dynamic voltage comparators | relaxation oscillators | standard cell-based design | supply voltage scalable IC design | ultra-low-power circuits | ultra-low-voltage
  - ? Quartile:
    - 2025:
      - ? Engineering (miscellaneous) (Q3, rank 140, percentile 49)
      - ? Computer Science (miscellaneous) (Q3, rank 104, percentile 40)
      - ? Materials Science (miscellaneous) (Q3, rank 151, percentile 38)
  - ? Source Id: 21101317176
  - ? Author Ids: 57212143527
  - ? Authoraffiliationids: 60025153
  - ? Corresponding: Aiello O.
2.
  - ? Title: A reduced effort design, low power, extremely compact, CMOS ADC based on voltage-to-time converter
  - ? Venue: AEU International Journal of Electronics and Communications
  - ? Year: 2025
  - ? Type: Journal
  - ? Subtype: Article
  - ? Citations: 3
  - ? DOI: 10.1016/j.aeue.2025.155790
  - ? Scopus ID: 2-s2.0-105001875819
  - ? Issn: 14348411
  - ? eISSN: 16180399
  - ? Volume: 196
  - ? Authors: Di Patrizio Stanchieri Guido; Aiello Orazio; De Marcellis Andrea
  - ? Keywords: High-synthesizable | Low-voltage low-power CMOS ADC | Voltage-to-Time converter
  - ? Quartile:
    - 2025:
      - ? Electrical and Electronic Engineering (Q1, rank 222, percentile 77)
  - ? Source Id: 17683
  - ? Author Ids: 57191657351;57212143527;23975554000
  - ? Authoraffiliationids: 60018783;60025153;60018783
  - ? Corresponding: Di Patrizio Stanchieri G.
3.
  - ? Title: A 48 nW, Universal, Multi-Mode Gm-C Filter with a Frequency Range Tunability
  - ? Venue: Electronics Switzerland
  - ? Year: 2025
  - ? Type: Journal

? Subtype: Article  
? Citations: 0  
? DOI: 10.3390/electronics14071334  
? Scopus ID: 2-s2.0-105002307694  
? eISSN: 20799292  
? Volume: 14  
? Issue: 7  
? Authors: Namdari Ali; Aiello Orazio; Dolatshahi Mehdi; Caviglia Daniele D.  
? Keywords: CMOS | Gm-C | low power | low voltage | tunability | universal filter  
? Quartile:  
2025:  
? Signal Processing (Q1, rank 36, percentile 81)  
? Electrical and Electronic Engineering (Q1, rank 220, percentile 78)  
? Control and Systems Engineering (Q1, rank 91, percentile 76)  
? Computer Networks and Communications (Q1, rank 131, percentile 76)  
? Hardware and Architecture (Q2, rank 62, percentile 73)  
? Source Id: 21100829272  
? Author Ids: 57217935624;57212143527;53063559900;7004012654  
? Authoraffiliationids: 60025153;60025153;60026904;60025153  
? Corresponding: Namdari A.

4.  
? Title: Low Power Design of Approximate Adders Based on Inexact Full Adder  
? Venue: Lecture Notes in Electrical Engineering  
? Year: 2025  
? Type: Book Series  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1007/978-3-031-71518-1\_5  
? Scopus ID: 2-s2.0-85215969233  
? Issn: 18761100  
? eISSN: 18761119  
? Volume: 1263 Lnee  
? Pages: 35-40  
? Authors: Ibrahim Ali; Bzeih Fatima; Srour Oussama; Hijazi Zeinab; Aiello Orazio  
? Keywords: Approximate Computing | Inexact Adders | Logic Gate Architectures | Low Power Design | VLSI circuits  
? Quartile:  
2025:

? Industrial and Manufacturing Engineering (Q4, rank 330, percentile 19)  
? Source Id: 19700186822  
? Author Ids: 57199654883;59527204300;59527428100;57188768487;57212143527  
? Authoraffiliationids: 60112476;60112476;60112476;60112476;60025153  
? Corresponding: Ibrahim A.

5.  
? Title: 0.7 V, 215 nW Tunable Universal Gm-C Filter  
? Venue: Lecture Notes in Electrical Engineering  
? Year: 2025  
? Type: Book Series  
? Subtype: Conference Paper  
? Citations: 2  
? Doi: 10.1007/978-3-031-71518-1\_6  
? Scopus ID: 2-s2.0-85215957715  
? Issn: 18761100  
? eISSN: 18761119

? Volume: 1263 Lnee  
? Pages: 41-47  
? Authors: Namdari Ali; Aiello Orazio; Caviglia Daniele D.  
? Keywords: CMOS | Gm-C | Inverter | Low-power | Tunability | Universal filter  
? Quartile:  
2025:  
? Industrial and Manufacturing Engineering (Q4, rank 330, percentile 19)  
? Source Id: 19700186822  
? Author Ids: 57217935624;57212143527;7004012654  
? Authoraffiliationids: 60025153;60025153;60025153  
? Corresponding: Namdari A.

6.  
? Title: A Fully Integrated CMOS 0.3 V 335 nW PWM-Based Light-to-Digital Converter for Optoelectronic Sensing Systems in Biomedical Applications  
? Venue: IEEE Sensors Letters  
? Year: 2025  
? Type: Journal  
? Subtype: Article  
? Citations: 5  
? Doi: 10.1109/Lsens.2025.3527759  
? Scopus ID: 2-s2.0-85214885457  
? eISSN: 24751472  
? Volume: 9  
? Issue: 2  
? Authors: Stanchieri G. Di Patrizio; De Marcellis A.; Faccio M.; Palange E.; Aiello O.  
? Keywords: Electromagnetic wave sensors | integrated photodiode | light-to-digital converter (LDC) | low-power | low-voltage | optoelectronic sensing system  
? Quartile:  
2025:  
? Instrumentation (Q2, rank 70, percentile 63)  
? Electrical and Electronic Engineering (Q2, rank 397, percentile 60)  
? Source Id: 21100976671  
? Author Ids: 57191657351;23975554000;7003775870;6701392461;57212143527  
? Authoraffiliationids: 60018783;60018783;60018783;60018783;60025153  
? Corresponding: Stanchieri G.D.P.

7.  
? Title: Sub-10nW, 73dB Gain, Inverter-Based Digital OTA with C-Muller Input Stage and Novel CMFB for Enhanced Performance in IoT Applications  
? Venue: 2025 23rd IEEE Interregional Newcas Conference Newcas 2025  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? DOI: 10.1109/NewCAS64648.2025.11107004  
? Scopus ID: 2-s2.0-105015575577  
? Pages: 573-577  
? Authors: Sala Riccardo Della; Shokri Reza; Aiello Orazio; Caviglia Daniele D.; Scotti Giuseppe  
? Keywords: Internet of Things | inverter-based | OTA | ultra-low voltage | ultralow power  
? Source Id: 21101328533  
? Author Ids: 57462337300;57224794408;57212143527;7004012654;35491669000  
? Authoraffiliationids: 60032350;60025153;60025153;60025153;60032350  
? Corresponding: Sala R.D.

8.

- ? Title: A 200 FOML, 0.3 V, and 2nW Fully Differential Bulk-Driven OTA Exploiting Current Mirrors
- ? Venue: 2025 23rd IEEE Interregional Newcas Conference Newcas 2025
- ? Year: 2025
- ? Type: Conference Proceeding
- ? Subtype: Conference Paper
- ? Citations: 0
- ? DOI: 10.1109/NewCAS64648.2025.11107128
- ? Scopus ID: 2-s2.0-105015512214
- ? Pages: 366-370
- ? Authors: Sala Riccardo Della; Ul Amin Noor; Aiello Orazio; Sidek Roslina Mohd; Rokhani Fakhrul Zaman; Tommasino Pasquale
- ? Keywords: biomedical | body-driven | fully differential | Internet-of-things | OTA | ultra-low power | ultra-low voltage
- ? Source Id: 21101328533
- ? Author Ids: 57462337300;60090688500;57212143527;35801306500;24483802400;6701510672
- ? Authoraffiliationids: 60032350;60025153;60025153;60025577;60025577;60032350
- ? Corresponding: Sala R.D.

9.

- ? Title: Exploring 0.3V Inverter Based OTA Designs with NOR3-Based Common Mode Feedback
- ? Venue: 2025 23rd IEEE Interregional Newcas Conference Newcas 2025
- ? Year: 2025
- ? Type: Conference Proceeding
- ? Subtype: Conference Paper
- ? Citations: 0
- ? DOI: 10.1109/NewCAS64648.2025.11107086
- ? Scopus ID: 2-s2.0-105015483240
- ? Pages: 435-439
- ? Authors: Sala Riccardo Della; Aiello Orazio; Nguyen Ngo Doanh; Bui Duy Hieu; Tran Xuan Tu; Scotti Giuseppe
- ? Keywords: Component | Internet of Things | inverter-based | OTA | Ultra Low Power | ultra-low voltage
- ? Source Id: 21101328533
- ? Author Ids: 57462337300;57212143527;57215284775;56024941700;16308138900;35491669000
- ? Authoraffiliationids: 60032350;60025153;60025153-60071364;60071364;60071364;60032350
- ? Corresponding: Sala R.D.

10.

- ? Title: A 138.39 FoMS, 2.8 nW, 65dB, Digital-Based OTA for Bio-Signal Processing Applications
- ? Venue: 2025 23rd IEEE Interregional Newcas Conference Newcas 2025
- ? Year: 2025
- ? Type: Conference Proceeding
- ? Subtype: Conference Paper
- ? Citations: 0
- ? DOI: 10.1109/NewCAS64648.2025.11106971
- ? Scopus ID: 2-s2.0-105015439783
- ? Pages: 361-365
- ? Authors: Sala Riccardo Della; Namdari Ali; Aiello Orazio; Caviglia Daniele D.; Tommasino Pasquale
- ? Keywords: High-Gain | Inverter | OTA | Subthreshold | Ultra-low power
- ? Source Id: 21101328533
- ? Author Ids: 57462337300;57217935624;57212143527;7004012654;6701510672
- ? Authoraffiliationids: 60032350;60025153;60025153;60025153;60032350

? Corresponding: Sala R.D.

11.

? Title: VDD -Scalable and Reference-Less Body-Biased Inverter-Based OTA Exploiting Improved Composite Transistors for ULV/ULP Applications  
? Venue: 2025 23rd IEEE Interregional Newcas Conference Newcas 2025  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? DOI: 10.1109/NewCAS64648.2025.11107142  
? Scopus ID: 2-s2.0-105015379690  
? Pages: 346-350  
? Authors: Privitera Marco; Radovalho Luis Henrique; Aiello Orazio; Grasso Alfio Dario; Alioto Massimo  
? Keywords: inverter-based amplifiers | ultra-low power | ultra-low-voltage  
? Source Id: 21101328533  
? Author Ids: 57224407950;60090278600;57212143527;12446187600;7004256085  
? Authoraffiliationids: 60010146;60009778;60025153;60010146;60017161  
? Corresponding: Privitera M.

12.

? Title: Multipolar Stimulator for Deep Brain Stimulation With Suppression of Stimulation-Induced Common-Mode Artifacts  
? Venue: IEEE Access  
? Year: 2025  
? Type: Journal  
? Subtype: Article  
? Citations: 0  
? Doi: 10.1109/Access.2025.3602824  
? Scopus ID: 2-s2.0-105014777590  
? eISSN: 21693536  
? Volume: 13  
? Pages: 150458-150472  
? Authors: Shokri Reza; Koolivand Yarallah; Shoaei Omid; Caviglia Daniele D.; Aiello Orazio  
? Keywords: Current mode stimulation | electrical stimulation | implantable biomedical devices | multipolar stimulation | recording systems | simultaneous stimulation  
? Quartile:  
2025:  
? Engineering (all) (Q1, rank 42, percentile 88)  
? Computer Science (all) (Q1, rank 41, percentile 83)  
? Materials Science (all) (Q1, rank 101, percentile 78)  
? Source Id: 21100374601  
? Author Ids: 57224794408;8645344400;7004130929;7004012654;57212143527  
? Authoraffiliationids: 60022927-60025153;60016248;60022927;60025153;60025153  
? Corresponding: Shokri R.

13.

? Title: A 180-nm CMOS Integrated Capacitance-to-Time Converter for Capacitive Sensing Applications  
? Venue: IEEE Sensors Journal  
? Year: 2025  
? Type: Journal  
? Subtype: Article  
? Citations: 0  
? Doi: 10.1109/Jsen.2025.3597027

- ? Scopus ID: 2-s2.0-105013339274  
? Issn: 1530437x  
? eISSN: 15581748  
? Volume: 25  
? Issue: 19  
? Pages: 36395-36406  
? Authors: Darwish Hala; Reig C^ndid; Leger Gildas; Di Patrizio Stanchieri Guido; Aiello Orazio; De Marcellis Andrea  
? Keywords: Capacitance-to-time converter | CMOS integrated circuit | differential capacitance sensors  
? Quartile:  
2025:  
? Instrumentation (Q1, rank 27, percentile 85)  
? Electrical and Electronic Engineering (Q1, rank 175, percentile 82)  
? Source Id: 15047  
? Author Ids: 58594565100;7003954653;7003334321;57191657351;57212143527;23975554000  
? Authoraffiliationids: 60002644;60002644;60023841;60018783;60025153;60018783  
? Corresponding: Darwish H.
14.  
? Title: Live Demonstration: Sea Wave Energy Harvester for Environmental Monitoring Buoys  
? Venue: Proceedings IEEE International Symposium on Circuits and Systems  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Iscas56072.2025.11044215  
? Scopus ID: 2-s2.0-105010582076  
? Issn: 02714310  
? Authors: Nicora Filippo; Aiello Orazio; Boragno Corrado; Caviglia Daniele D.; Lo Schiavo Alessandro  
? Keywords: Energy Harvester | Wave Energy Converter  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)  
? Source Id: 56190  
? Author Ids: 59302586800;57212143527;56214231400;7004012654;59227633100  
? Authoraffiliationids: 60025153;60025153;60025153;60025153;60026777  
? Corresponding: Nicora F.
15.  
? Title: Live Demonstration: Energy Autonomous Wireless Sensor Node for Oxygen Monitoring with LoRa Connectivity  
? Venue: Proceedings IEEE International Symposium on Circuits and Systems  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Iscas56072.2025.11043568  
? Scopus ID: 2-s2.0-105010581705  
? Issn: 02714310  
? Authors: La Rosa Roberto; Aiello Orazio  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)

? Source Id: 56190  
? Author Ids: 55516276800;57212143527  
? Authoraffiliationids: 108144405;60025153  
? Corresponding: La Rosa R.

16.

? Title: An Inverter-Based Difference Differential Amplifier with Active Frequency Compensation  
? Venue: 2025 IEEE 16th Latin American Symposium on Circuits and Systems Lascas 2025 Proceedings  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Lascas64004.2025.10966275  
? Scopus ID: 2-s2.0-105004560858  
? Authors: Rodovalho Luis Henrique; Aiello Orazio  
? Keywords: CMOS inverter | difference differential amplifier | inverter-based amplifier  
? Source Id: 21101293113  
? Author Ids: 57190740930;57212143527  
? Authoraffiliationids: 60017609;60025153  
? Corresponding: Rodovalho L.H.

17.

? Title: A Novel 0.62 nW Inverter Based Digital-OTA  
? Venue: 2025 IEEE 16th Latin American Symposium on Circuits and Systems Lascas 2025 Proceedings  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Lascas64004.2025.10966369  
? Scopus ID: 2-s2.0-105004558819  
? Authors: Sala Riccardo Della; Aiello Orazio; Scotti Giuseppe  
? Keywords: Internet of Things | inverter-based | OTA | ultra-low power | ultra-low voltage  
? Source Id: 21101293113  
? Author Ids: 57462337300;57212143527;35491669000  
? Authoraffiliationids: 60032350;60025153;60032350  
? Corresponding: Sala R.D.

18.

? Title: A 0.3V, 2.34nW and 56db Gain Bulk-Driven OTA Exploiting Cascode Output Stages and Enhanced Current Mirrors  
? Venue: 2025 IEEE 16th Latin American Symposium on Circuits and Systems Lascas 2025 Proceedings  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Lascas64004.2025.10966355  
? Scopus ID: 2-s2.0-105004557500  
? Authors: Sala Riccardo Della; Aiello Orazio; Scotti Giuseppe  
? Keywords: body-driven | Internet of Things | OTA | ultra-low power | ultra-low voltage  
? Source Id: 21101293113

- ? Author Ids: 57462337300;57212143527;35491669000  
? Authoraffiliationids: 60032350;60025153;60032350  
? Corresponding: Sala R.D.
19.  
? Title: Sustainable, Battery-Free Wireless Sensor Node with LoRaWAN Connectivity in ABP and OTAA Activation Modes  
? Venue: 2025 IEEE 16th Latin American Symposium on Circuits and Systems Lascas 2025 Proceedings  
? Year: 2025  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Lascas64004.2025.10966344  
? Scopus ID: 2-s2.0-105004551157  
? Authors: Rosa Roberto La; Firpo Pietro; Aiello Orazio  
? Keywords: ABP (Activation By Personalization) | Autonomous Systems | Energy Harvesting | Environmental Monitoring | IoT (Internet of Things) | LoRaWAN | OTAA (Over-The-Air Activation) | Sustainable Energy | Wireless Sensor Node  
? Source Id: 21101293113  
? Author Ids: 55516276800;58512300500;57212143527  
? Authoraffiliationids: 108144405;60025153;60025153  
? Corresponding: Rosa R.L.
20.  
? Title: A Reconfigurable, Nonlinear, Low-Power, VCO-Based ADC for Neural Recording Applications  
? Venue: Sensors  
? Year: 2024  
? Type: Journal  
? Subtype: Article  
? Citations: 1  
? DOI: 10.3390/s24196161  
? Scopus ID: 2-s2.0-85206334725  
? eISSN: 14248220  
? Volume: 24  
? Issue: 19  
? Authors: Shokri Reza; Koolivand Yarallah; Shoaei Omid; Caviglia Daniele D.; Aiello Orazio  
? Keywords: neural recording systems | nonlinear quantization | parabolic function ADC | VCO-based ADC  
? Quartile:  
2025:  
? Instrumentation (Q1, rank 19, percentile 90)  
? Electrical and Electronic Engineering (Q1, rank 136, percentile 86)  
? Atomic and Molecular Physics, and Optics (Q1, rank 36, percentile 85)  
? Biochemistry (Q1, rank 72, percentile 84)  
? Information Systems (Q1, rank 87, percentile 82)  
? Analytical Chemistry (Q1, rank 30, percentile 82)  
2024:  
? Instrumentation (Q1, rank 21, percentile 88)  
? Electrical and Electronic Engineering (Q1, rank 145, percentile 85)  
? Analytical Chemistry (Q1, rank 30, percentile 81)  
? Atomic and Molecular Physics, and Optics (Q1, rank 44, percentile 81)  
? Information Systems (Q1, rank 91, percentile 80)  
? Biochemistry (Q1, rank 86, percentile 80)

? Source Id: 130124

? Author Ids: 57224794408;8645344400;7004130929;7004012654;57212143527

? Authoraffiliationids: 60022927-60025153;60016248;60022927;60025153;60025153

? Corresponding: Shokri R.

21.

? Title: A 0.5 V, 32 nW Compact Inverter-Based All-Filtering Response Modes Gm-C Filter for Bio-Signal Processing

? Venue: Journal of Low Power Electronics and Applications

? Year: 2024

? Type: Journal

? Subtype: Article

? Citations: 4

? DOI: 10.3390/jlpea14030040

? Scopus ID: 2-s2.0-85205081677

? eISSN: 20799268

? Volume: 14

? Issue: 3

? Authors: Namdari Ali; Aiello Orazio; Caviglia Daniele D.

? Keywords: CMOS | Gm-C | low-power | low-voltage | universal filter

? Quartile:

2025:

? Electrical and Electronic Engineering (Q2, rank 355, percentile 64)

2024:

? Electrical and Electronic Engineering (Q2, rank 339, percentile 65)

? Source Id: 21100332242

? Author Ids: 57217935624;57212143527;7004012654

? Authoraffiliationids: 60025153;60025153;60025153

? Corresponding: Namdari A.

22.

? Title: Analysis of a Sea Wave Energy Harvester for Environmental Monitoring Buoys

? Venue: Proceedings of the IEEE International Conference on Electronics Circuits and Systems

? Year: 2024

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 1

? Doi: 10.1109/lcecs61496.2024.10848561

? Scopus ID: 2-s2.0-85217616684

? Issn: 29945755

? eISSN: 29950589

? Authors: Aiello Orazio; Boragno Corrado; Caviglia Daniele D.; Schiavo Alessandro Lo; Nicora Filippo

? Keywords: Energy Harvester | Hybrid Harvesters | Internet of Things | Wave Energy Converter | Wireless Sensor Networks

? Quartile:

2025:

? Electrical and Electronic Engineering (Q4, rank 913, percentile 8)

2024:

? Electrical and Electronic Engineering (Q4, rank 941, percentile 2)

? Source Id: 91096

? Author Ids: 57212143527;56214231400;7004012654;59227633100;59302586800

? Authoraffiliationids: 60025153;60025153;60025153;60026777;60025153

? Corresponding: Aiello O.

23.

? Title: Highly Linear, Digital OTA With Modified Input Stage  
? Venue: 2024 19th Conference on Ph D Research in Microelectronics and Electronics Prime 2024  
? Year: 2024  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 1  
? Doi: 10.1109/Prime61930.2024.10559685  
? Scopus ID: 2-s2.0-85199267708  
? Authors: Shokri Reza; Caviglia Daniele D.; Aiello Orazio  
? Keywords: fully-digital | Operational Transconductance Amplifier (OTA) | ultra-low power | ultra-low voltage  
? Source Id: 21101237948  
? Author Ids: 57224794408;7004012654;57212143527  
? Authoraffiliationids: 60025153;60025153;60025153  
? Corresponding: Shokri R.

24.

? Title: 0.5V 32nW Inverter-Based Gm-C Filter for Bio-Signal Processing

? Venue: Proceedings IEEE International Symposium on Circuits and Systems

? Year: 2024

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 8

? Doi: 10.1109/lscas58744.2024.10558655

? Scopus ID: 2-s2.0-85198561757

? Issn: 02714310

? Authors: Namdari Ali; Aiello Orazio; Caviglia Daniele D.

? Keywords: CMOS | Gm-C | Low-power | Low-Voltage | Universal filter

? Quartile:

2025:

? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)

2024:

? Electrical and Electronic Engineering (Q3, rank 537, percentile 44)

? Source Id: 56190

? Author Ids: 57217935624;57212143527;7004012654

? Authoraffiliationids: 60025153;60025153;60025153

? Corresponding: Namdari A.

25.

? Title: Fully Synthesizable Dynamic Voltage Comparator across technology nodes and scaled supply voltages

? Venue: Proceedings IEEE International Symposium on Circuits and Systems

? Year: 2024

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 2

? Doi: 10.1109/lscas58744.2024.10557872

? Scopus ID: 2-s2.0-85198532529

? Issn: 02714310

? Authors: Bui Duy Hieu; Tran Duc Manh; Caviglia Daniele D.; Aiello Orazio

? Keywords: deep subthreshold | Dynamic voltage comparator | fully synthesizable | standard-cell design | technology-nodes and voltage scalability | ultra-low voltage

? Quartile:

2025:

? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)

2024:

? Electrical and Electronic Engineering (Q3, rank 537, percentile 44)

? Source Id: 56190

? Author Ids: 56024941700;57546819900;7004012654;57212143527

? Authoraffiliationids: 60071364;60071364;60025153;60025153

? Corresponding: Bui D.H.

26.

? Title: Inverter-Based Amplifier with Active Frequency Compensation and Adaptive Voltage Scaling

? Venue: Proceedings IEEE International Symposium on Circuits and Systems

? Year: 2024

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 4

? Doi: 10.1109/Iscas58744.2024.10558561

? Scopus ID: 2-s2.0-85198524520

? Issn: 02714310

? Authors: Rodovalho Luis Henrique; Aiello Orazio

? Keywords: adaptive body-biasing | adaptive voltage scaling | CMOS inverter | inverter-based amplifier | PVT robust amplifier

? Quartile:

2025:

? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)

2024:

? Electrical and Electronic Engineering (Q3, rank 537, percentile 44)

? Source Id: 56190

? Author Ids: 57190740930;57212143527

? Authoraffiliationids: 60017609;60025153

? Corresponding: Rodovalho L.H.

27.

? Title: A 0.4 V 180 nm CMOS Sub-?W Ultra-Compact and Low-Effort Design PWM-Based ADC

? Venue: Proceedings IEEE International Symposium on Circuits and Systems

? Year: 2024

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 4

? Doi: 10.1109/Iscas58744.2024.10558592

? Scopus ID: 2-s2.0-85198524162

? Issn: 02714310

? Authors: Di Patrizio Stanchieri Guido; Aiello Orazio; De Marcellis Andrea

? Keywords: Highly-Synthesizable | Invert-Based ADC | IP-Reuse | Pulse-Width-Modulator | Sub-0.6 V Supply Voltage

? Quartile:

2025:

? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)

2024:

? Electrical and Electronic Engineering (Q3, rank 537, percentile 44)

? Source Id: 56190

? Author Ids: 57191657351;57212143527;23975554000

? Authoraffiliationids: 60018783;60025153;60018783

? Corresponding: Di Patrizio Stanchieri G.

28.

? Title: SRAM-based Physically Unclonable Function using Lightweight Hamming-Code Fuzzy Extractor for Energy Harvesting Beat Sensors

? Venue: International Conference on Advanced Technologies for Communications  
? Year: 2024  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1109/Atc63255.2024.10908150  
? Scopus ID: 2-s2.0-105000800484  
? Issn: 21621039  
? eISSN: 21621020  
? Pages: 499-504  
? Authors: Pham Hoang Long; Bui Duy Hieu; Tran Xuan Tu; Aiello Orazio  
? Keywords: Beat Sensors | Internet of Things | Physically Unclonable Function  
? Quartile:  
2025:  
? Computer Networks and Communications (Q4, rank 427, percentile 22)  
? Hardware and Architecture (Q4, rank 194, percentile 17)  
? Software (Q4, rank 443, percentile 11)  
2024:  
? Computer Networks and Communications (Q4, rank 395, percentile 22)  
? Hardware and Architecture (Q4, rank 189, percentile 15)  
? Software (Q4, rank 422, percentile 13)  
? Source Id: 20600195633  
? Author Ids: 57220746985;56024941700;16308138900;57212143527  
? Authoraffiliationids: 60071364;60071364;60071364;60025153  
? Corresponding: Pham H.L.

29.

? Title: Capacitance-to-digital converter in dual-mode logic: power consumption vs conversion time trade-off  
? Venue: Analog Integrated Circuits and Signal Processing  
? Year: 2023  
? Type: Journal  
? Subtype: Article  
? Citations: 2  
? DOI: 10.1007/s10470-023-02173-9  
? Scopus ID: 2-s2.0-85165092514  
? Issn: 09251030  
? eISSN: 15731979  
? Volume: 117  
? Issue: 1-3  
? Pages: 35-44  
? Authors: Aiello Orazio; Crovetti Paolo  
? Keywords: Capacitive-to-digital converter (CDC) | Dual-mode (DM) logic | nW power | Power consumption versus time conversion trade-off | Ultra-low voltage  
? Quartile:  
2025:  
? Signal Processing (Q2, rank 82, percentile 58)  
? Hardware and Architecture (Q2, rank 116, percentile 50)  
? Surfaces, Coatings and Films (Q3, rank 80, percentile 42)  
2023:  
? Signal Processing (Q3, rank 68, percentile 48)  
? Surfaces, Coatings and Films (Q3, rank 71, percentile 46)  
? Hardware and Architecture (Q3, rank 102, percentile 42)  
? Source Id: 25569  
? Author Ids: 57212143527;6506207582

? Authoraffiliationids: 60025153;60012162

? Corresponding: Aiello O.

30.

? Title: Monitoring the Air Quality in an HVAC System via an Energy Harvesting Device

? Venue: Sensors

? Year: 2023

? Type: Journal

? Subtype: Article

? Citations: 3

? DOI: 10.3390/s23146381

? Scopus ID: 2-s2.0-85166028387

? Issn: 14248220

? Volume: 23

? Issue: 14

? Authors: Boragno Corrado; Aiello Orazio; Caviglia Daniele D.

? Keywords: air flux | autonomous wireless sensor networks | battery-less air monitoring | powering HVAC systems | wind energy harvesting

? Quartile:

2025:

? Instrumentation (Q1, rank 19, percentile 90)

? Electrical and Electronic Engineering (Q1, rank 136, percentile 86)

? Atomic and Molecular Physics, and Optics (Q1, rank 36, percentile 85)

? Biochemistry (Q1, rank 72, percentile 84)

? Information Systems (Q1, rank 87, percentile 82)

? Analytical Chemistry (Q1, rank 30, percentile 82)

2023:

? Instrumentation (Q1, rank 24, percentile 83)

? Electrical and Electronic Engineering (Q1, rank 163, percentile 79)

? Atomic and Molecular Physics, and Optics (Q1, rank 48, percentile 78)

? Analytical Chemistry (Q1, rank 36, percentile 77)

? Information Systems (Q1, rank 91, percentile 77)

? Biochemistry (Q2, rank 133, percentile 69)

? Source Id: 130124

? Author Ids: 56214231400;57212143527;7004012654

? Authoraffiliationids: 60025153;60025153;60025153

? Corresponding: Boragno C.

31.

? Title: Ultra-Low-Power ICs for the Internet of Things

? Venue: Journal of Low Power Electronics and Applications

? Year: 2023

? Type: Journal

? Subtype: Editorial

? Citations: 4

? DOI: 10.3390/jlpea13020038

? Scopus ID: 2-s2.0-85163650949

? eISSN: 20799268

? Volume: 13

? Issue: 2

? Authors: Aiello Orazio

? Quartile:

2025:

? Electrical and Electronic Engineering (Q2, rank 355, percentile 64)

2023:

? Electrical and Electronic Engineering (Q2, rank 366, percentile 54)

? Source Id: 21100332242  
? Author Ids: 57212143527  
? Authoraffiliationids: 60025153  
? Corresponding: Aiello O.

32.

? Title: Rail-to-rail input/output bulk driven class AB operational amplifier with improved composite transistors  
? Venue: Analog Integrated Circuits and Signal Processing  
? Year: 2023  
? Type: Journal  
? Subtype: Article  
? Citations: 3  
? DOI: 10.1007/s10470-023-02160-0  
? Scopus ID: 2-s2.0-85160644835  
? Issn: 09251030  
? eISSN: 15731979  
? Volume: 115  
? Issue: 3  
? Pages: 279-291  
? Authors: Rodovalho Luis Henrique; Rodrigues Cesar Ramos; Aiello Orazio  
? Keywords: Composite transistors | Current mirror | Forward-body-biasing | Open source PDK | Operational amplifier  
? Quartile:  
2025:  
? Signal Processing (Q2, rank 82, percentile 58)  
? Hardware and Architecture (Q2, rank 116, percentile 50)  
? Surfaces, Coatings and Films (Q3, rank 80, percentile 42)  
2023:  
? Signal Processing (Q3, rank 68, percentile 48)  
? Surfaces, Coatings and Films (Q3, rank 71, percentile 46)  
? Hardware and Architecture (Q3, rank 102, percentile 42)  
? Source Id: 25569  
? Author Ids: 57190740930;22036272700;57212143527  
? Authoraffiliationids: 60017609;60017609;60025153  
? Corresponding: Rodovalho L.H.

33.

? Title: Capacitance-to-Digital Converter for Harvested Systems Down to 0.3 V With No Trimming, Reference, and Voltage Regulation  
? Venue: IEEE Transactions on Circuits and Systems I Regular Papers  
? Year: 2023  
? Type: Journal  
? Subtype: Article  
? Citations: 5  
? Doi: 10.1109/TCSI.2023.3237694  
? Scopus ID: 2-s2.0-85147291590  
? Issn: 15498328  
? eISSN: 15580806  
? Volume: 70  
? Issue: 4  
? Pages: 1439-1449  
? Authors: Aiello Orazio; Crovetti Paolo Stefano; Alioto Massimo  
? Keywords: Capacitance-to-digital converter (CDC) | energy harvesting | IoT | ultra-low power | ultra-low voltage  
? Quartile:

2025:

? Engineering (all) (Q1, rank 28, percentile 92)

2023:

? Subject (Q1, rank 99, percentile 87)

? Subject (Q1, rank 24, percentile 86)

? Source Id: 11000153733

? Author Ids: 57212143527;6506207582;7004256085

? Authoraffiliationids: 60025153;60012162;60017161

? Corresponding: Aiello O.

34.

? Title: A Nonlinear, Low-Power, VCO-Based ADC for Neural Recording Applications

? Venue: 2023 5th Iranian International Conference on Microelectronics licm 2023

? Year: 2023

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 2

? Doi: 10.1109/licm60532.2023.10443199

? Scopus ID: 2-s2.0-85187215044

? Pages: 199-203

? Authors: Shokri Reza; Koolivand Yarallah; Shoaei Omid; Aiello Orazio; Caviglia Daniele

? Keywords: Neural recording systems | nonlinear quantization | parabolic function ADC | VCO-based ADC

? Source Id: 21101206204

? Author Ids: 57224794408;8645344400;7004130929;57212143527;7004012654

? Authoraffiliationids: 60022927;60016248;60022927;60025153;60025153

? Corresponding: Shokri R.

35.

? Title: Multipolar Stimulator for DBS Application with Concurrent Imbalance Compensation

? Venue: Icecs 2023 2023 30th IEEE International Conference on Electronics Circuits and Systems Technosapiens for Saving Humanity

? Year: 2023

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 2

? Doi: 10.1109/Icecs58634.2023.10382867

? Scopus ID: 2-s2.0-85183582430

? Authors: Shokri Reza; Koolivand Yarallah; Shoaei Omid; Aiello Orazio; Caviglia Daniele D.

? Keywords: current mode stimulation | electrical stimulation | Implantable biomedical devices | multipolar stimulation

? Source Id: 21101198596

? Author Ids: 57224794408;8645344400;7004130929;57212143527;7004012654

? Authoraffiliationids: 60025153-60022927;60016248;60022927;60025153;60025153

? Corresponding: Shokri R.

36.

? Title: A 30 kHz - 3 GHz Clock Duty-Cycle Corrector Circuit for CMOS Integrated Digital Electronic Systems

? Venue: Mixed Design of Integrated Circuits and System Mixdes 2023

? Year: 2023

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 4

? Doi: 10.23919/Mixdes58562.2023.10203264

? Scopus ID: 2-s2.0-85169445124

? Pages: 73-78

? Authors: Di Patrizio Stanchieri Guido; De Marcellis Andrea; Faccio Marco; Palange Elia; Aiello Orazio

? Keywords: Clock Generators | CMOS Integrated Digital Systems | DLL | Duty-Cycle Corrector Circuits | PLL | RAM Memory

? Source Id: 21101175279

? Author Ids: 57191657351;23975554000;7003775870;6701392461;57212143527

? Authoraffiliationids: 60018783;60018783;60018783;60018783;60025153

? Corresponding: Di Patrizio Stanchieri G.

37.

? Title: Improving Energy Harvesting Performance of the PVDF Films by adding Nano ZnO

? Venue: 2023 5th International Conference on Advances in Computational Tools for Engineering Applications Actea 2023

? Year: 2023

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 1

? Doi: 10.1109/Actea58025.2023.10194067

? Scopus ID: 2-s2.0-85168910916

? Pages: 201-204

? Authors: Hamdan Rawad; Alyosef Ayham; Aiello Orazio; Caviglia Daniele

? Keywords: energy conversion efficiency | energy harvesting | nano ZnO | pyroelectric coefficient | pyroelectricity

? Source Id: 21101173124

? Author Ids: 57195680082;57222742064;57212143527;7004012654

? Authoraffiliationids: 60072762;60025153;60025153;60025153

? Corresponding: Hamdan R.

38.

? Title: 38.4-pW, 0.14-mm<sup>2</sup>Body-Driven Temperature-to-Digital Converter and Voltage Reference with 0.6-1.6-V Unregulated Supply for Battery-Less Systems

? Venue: Digest of Technical Papers Symposium on VLSI Technology

? Year: 2023

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 2

? DOI: 10.23919/VLSITechnologyandCir57934.2023.10185359

? Scopus ID: 2-s2.0-85167588527

? Issn: 07431562

? Volume: 2023-June

? Authors: Fassio Luigi; Aiello Orazio; Alioto Massimo

? Quartile:

2025:

? Electrical and Electronic Engineering (Q2, rank 342, percentile 65)

2023:

? Electrical and Electronic Engineering (Q2, rank 386, percentile 51)

? Source Id: 14937

? Author Ids: 57218767161;57212143527;7004256085

? Authoraffiliationids: 60017161;60017161;60017161

? Corresponding: Fassio L.

39.

? Title: Mitigating Cyber Attacks in LoRaWAN via Lightweight Secure Key Management Scheme

- ? Venue: IEEE Access  
? Year: 2023  
? Type: Journal  
? Subtype: Article  
? Citations: 8  
? Doi: 10.1109/Access.2023.3291420  
? Scopus ID: 2-s2.0-85164415741  
? eISSN: 21693536  
? Volume: 11  
? Pages: 68301-68315  
? Authors: Qadir Junaid; Butun Ismail; Gastaldo Paolo; Aiello Orazio; Caviglia Daniele D.  
? Keywords: ECDH | key derivation | key exchanging | LoRa | LoRaWAN | security | security enhancement  
? Quartile:  
2025:  
? Engineering (all) (Q1, rank 42, percentile 88)  
? Computer Science (all) (Q1, rank 41, percentile 83)  
? Materials Science (all) (Q1, rank 101, percentile 78)  
2023:  
? Engineering (all) (Q1, rank 23, percentile 92)  
? Computer Science (all) (Q1, rank 29, percentile 87)  
? Materials Science (all) (Q1, rank 77, percentile 83)  
? Source Id: 21100374601  
? Author Ids: 57213299572;35316899700;35612596100;57212143527;7004012654  
? Authoraffiliationids: 60002014-60025153;60002014-60197889;60025153;60025153;60025153  
? Corresponding: Qadir J.
40.  
? Title: Conversion Time-Power Tradeoff in Capacitance-to-Digital Converters with Dual-Mode Logic  
? Venue: 35th Sbc Sbmicro IEEE ACM Symposium on Integrated Circuits and Systems Design Sbcci 2022 Proceedings  
? Year: 2022  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 4  
? Doi: 10.1109/Sbcci55532.2022.9893227  
? Scopus ID: 2-s2.0-85141725111  
? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo  
? Keywords: Capacitive-to-Digital converter (CDC) | Dual-Mode (DM) Logic | nW Power | Power consumption versus Time conversion trade-off | Ultra-Low Voltage  
? Source Id: 21101120342  
? Author Ids: 57212143527;6506207582;7004256085  
? Authoraffiliationids: 60017161-60025153;60012162;60017161  
? Corresponding: Aiello O.
41.  
? Title: Capacitance-Based Voltage Regulation- and Reference-Free Temperature-to-Digital Converter down to 0.3 v and 2.5 nW for Direct Harvesting  
? Venue: Esscirc 2022 IEEE 48th European Solid State Circuits Conference Proceedings  
? Year: 2022  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 4  
? Doi: 10.1109/Esscirc55480.2022.9911378

? Scopus ID: 2-s2.0-85141541900  
? Pages: 381-384  
? Authors: Aiello Orazio; Alioto Massimo  
? Keywords: harvesting | Temperature sensing | ultra-low-power  
? Source Id: 21101119563  
? Author Ids: 57212143527;7004256085  
? Authoraffiliationids: 60017161-60025153;60017161  
? Corresponding: Aiello O.

42.

? Title: DDPMnet: All-Digital Pulse Density-Based DNN Architecture with 228 Gate Equivalents/MAC Unit, 28-TOPS/W and 1.5-TOPS/mm<sup>2</sup> in 40nm  
? Venue: Proceedings of the Custom Integrated Circuits Conference  
? Year: 2022  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 4  
? Doi: 10.1109/Cicc53496.2022.9772786  
? Scopus ID: 2-s2.0-85130720485  
? Issn: 08865930  
? Volume: 2022-April  
? Authors: Gupta Animesh; Konandur Viveka; Salam Thoithoi; Jain Saurabh; Aiello Orazio; Crovetti Paolo; Alioto Massimo  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q2, rank 399, percentile 60)  
2022:  
? Electrical and Electronic Engineering (Q2, rank 368, percentile 50)  
? Source Id: 83444  
? Author Ids:  
57703834900;57711452700;57711198900;57193628262;57212143527;6506207582;7004256085  
? Authoraffiliationids: 60017161;60017161;60017161;60017161;60017161;60012162;60017161  
? Corresponding: Gupta A.

43.

? Title: A 1.9 nw, sub-1 v, 542 pa/v linear bulk-driven ota with 154 db cmrr for bio-sensing applications  
? Venue: Journal of Low Power Electronics and Applications  
? Year: 2021  
? Type: Journal  
? Subtype: Article  
? Citations: 16  
? DOI: 10.3390/jlpea11040040  
? Scopus ID: 2-s2.0-85118220477  
? eISSN: 20799268  
? Volume: 11  
? Issue: 4  
? Authors: Silva Rafael Sanchotene; Rodovalho Luis Henrique; Aiello Orazio; Rodrigues Cesar Ramos  
? Keywords: Bulk-driven OTA | Self-cascode mirror | Transconductor  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q2, rank 355, percentile 64)  
2021:  
? Electrical and Electronic Engineering (Q2, rank 300, percentile 57)  
? Source Id: 21100332242

- ? Author Ids: 56729782500;57190740930;57212143527;22036272700  
? Authoraffiliationids: 60017609;60017609;60017161;60017609  
? Corresponding: Silva R.S.
- 44.
- ? Title: Design of digital OTAs with operation down to 0.3 V and NW power for direct harvesting  
? Venue: IEEE Transactions on Circuits and Systems I Regular Papers  
? Year: 2021  
? Type: Journal  
? Subtype: Article  
? Citations: 60  
? Doi: 10.1109/Tcsi.2021.3089339  
? Scopus ID: 2-s2.0-85109265617  
? Issn: 15498328  
? eISSN: 15580806  
? Volume: 68  
? Issue: 9  
? Pages: 3693-3706  
? Authors: Toledo Pedro; Crovetti Paolo; Aiello Orazio; Alioto Massimo  
? Keywords: Digital OTA | Internet of Things (IoT) | Low power | Low voltage | Operational transconductance amplifier (OTA)  
? Quartile:  
2025:  
? Engineering (all) (Q1, rank 28, percentile 92)  
2021:  
? Subject (Q1, rank 106, percentile 85)  
? Subject (Q1, rank 32, percentile 81)  
? Source Id: 11000153733  
? Author Ids: 56435887500;6506207582;57212143527;7004256085  
? Authoraffiliationids: 60012162;60012162;60017161;60017161  
? Corresponding: Toledo P.
- 45.
- ? Title: A 300mV-Supply, Sub-nW-Power Digital-Based Operational Transconductance Amplifier  
? Venue: IEEE Transactions on Circuits and Systems II Express Briefs  
? Year: 2021  
? Type: Journal  
? Subtype: Article  
? Citations: 37  
? Doi: 10.1109/Tcsii.2021.3084243  
? Scopus ID: 2-s2.0-85107216708  
? Issn: 15497747  
? eISSN: 15583791  
? Volume: 68  
? Issue: 9  
? Pages: 3073-3077  
? Authors: Toledo Pedro; Crovetti Paolo; Klimach Hamilton; Bampi Sergio; Aiello Orazio; Alioto Massimo  
? Keywords: digital-based analog processing | Internet of things (IoT) | operational transconductance amplifier (OTA) | Ultra-low voltage (ULV)  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q1, rank 97, percentile 90)  
2021:

? Electrical and Electronic Engineering (Q1, rank 149, percentile 79)  
? Source Id: 9500153930  
? Author Ids: 56435887500;6506207582;8544715900;6602489732;57212143527;7004256085  
? Authoraffiliationids: 60012162;60012162;60006726;60006726;60017161;60017161  
? Corresponding: Toledo P.

46.

? Title: Rail-to-rail dynamic voltage comparator scalable down to pW-Range power and 0.15-V supply  
? Venue: IEEE Transactions on Circuits and Systems II Express Briefs  
? Year: 2021  
? Type: Journal  
? Subtype: Article  
? Citations: 48  
? Doi: 10.1109/Tcsii.2021.3059164  
? Scopus ID: 2-s2.0-85101432027  
? Issn: 15497747  
? eISSN: 15583791  
? Volume: 68  
? Issue: 7  
? Pages: 2675-2679  
? Authors: Aiello Orazio; Crovetti Paolo; Toledo Pedro; Alioto Massimo  
? Keywords: Dynamic comparator | fully-synthesizable | Internet of Things | sensor nodes | ultra-low power | ultra-low voltage  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q1, rank 97, percentile 90)  
2021:  
? Electrical and Electronic Engineering (Q1, rank 149, percentile 79)  
? Source Id: 9500153930  
? Author Ids: 57212143527;6506207582;56435887500;7004256085  
? Authoraffiliationids: 60017161;60012162;60012162;60017161  
? Corresponding: Aiello O.

47.

? Title: Temperature Characterization of a Fully-synthesizable Rail-to-Rail Dynamic Voltage Comparator operating down to 0.15-V: (Invited paper)  
? Venue: 2021 19th IEEE International New Circuits and Systems Conference Newcas 2021  
? Year: 2021  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 5  
? Doi: 10.1109/Newcas50681.2021.9462749  
? Scopus ID: 2-s2.0-85114616365  
? Authors: Aiello Orazio; Toledo Pedro  
? Keywords: fully-synthesizable | Internet of Things | low area Dynamic comparator | low design effort | sensor nodes | standard cell-based | technology portable | Temperature dependence | ultra-low power | ultra-low voltage  
? Source Id: 21101058738  
? Author Ids: 57212143527;56435887500  
? Authoraffiliationids: 60017161;60012162  
? Corresponding: Aiello O.

48.

? Title: Self-biased and supply-voltage scalable inverter-based operational transconductance amplifier with improved composite transistors  
? Venue: Electronics Switzerland

? Year: 2021  
? Type: Journal  
? Subtype: Article  
? Citations: 29  
? DOI: 10.3390/electronics10080935  
? Scopus ID: 2-s2.0-85104042786  
? eISSN: 20799292  
? Volume: 10  
? Issue: 8  
? Authors: Rodovalho Luis Henrique; Rodrigues Cesar Ramos; Aiello Orazio  
? Keywords: Composite transistors | Improved forward-body-bias | Inverter-based OTA | Operational Transconductance Amplifier (OTA) | Push-pull based OTA | Supply-voltage scalable | Ultra-Low-Power (ULP) | Ultra-Low-Voltage (ULV)  
? Quartile:  
2025:  
? Signal Processing (Q1, rank 36, percentile 81)  
? Electrical and Electronic Engineering (Q1, rank 220, percentile 78)  
? Control and Systems Engineering (Q1, rank 91, percentile 76)  
? Computer Networks and Communications (Q1, rank 131, percentile 76)  
? Hardware and Architecture (Q2, rank 62, percentile 73)  
2021:  
? Electrical and Electronic Engineering (Q2, rank 280, percentile 60)  
? Computer Networks and Communications (Q2, rank 146, percentile 59)  
? Control and Systems Engineering (Q2, rank 110, percentile 59)  
? Signal Processing (Q2, rank 51, percentile 56)  
? Hardware and Architecture (Q2, rank 75, percentile 55)  
? Source Id: 21100829272  
? Author Ids: 57190740930;22036272700;57212143527  
? Authoraffiliationids: 60017609;60017609;60017161  
? Corresponding: Rodovalho L.H.  
49.  
? Title: Capacitance-to-Digital Converter for Operation under Uncertain Harvested Voltage down to 0.3V with No Trimming, Reference and Voltage Regulation  
? Venue: Digest of Technical Papers IEEE International Solid State Circuits Conference  
? Year: 2021  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 22  
? Doi: 10.1109/Isscc42613.2021.9365846  
? Scopus ID: 2-s2.0-85102333498  
? Issn: 01936530  
? Volume: 64  
? Pages: 74-76  
? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q1, rank 78, percentile 92)  
? Electronic, Optical and Magnetic Materials (Q1, rank 36, percentile 88)  
2021:  
? Electrical and Electronic Engineering (Q1, rank 41, percentile 94)  
? Electronic, Optical and Magnetic Materials (Q1, rank 24, percentile 90)  
? Source Id: 26020  
? Author Ids: 57212143527;6506207582;7004256085  
? Authoraffiliationids: 60017161;60012162;60017161

- ? Corresponding: Aiello O.
50.  
? Title: Fully-differential inverter-based OTA with improved composite transistors  
? Venue: 2021 IEEE Asia Pacific Conference on Circuits and Systems Apccas 2021 and 2021 IEEE Conference on Postgraduate Research in Microelectronics and Electronics Primeasia 2021  
? Year: 2021  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 5  
? Doi: 10.1109/Apccas51387.2021.9687735  
? Scopus ID: 2-s2.0-85126717965  
? Pages: 9-12  
? Authors: Rodovalho Luis Henrique; Aiello Orazio; Rodrigues Cesar Ramos  
? Keywords: CMOS inverter-based amplifiers | forward-body-biasing | improved composite transistors | rectangular transistor arrays | ultra-low-power | ultra-low-voltage  
? Source Id: 21101081706  
? Author Ids: 57190740930;57212143527;22036272700  
? Authoraffiliationids: 60017609;60017161;60017609  
? Corresponding: Rodovalho L.H.
51.  
? Title: An inverter-based OTA using improved composite transistors and bulk-driven common-mode rejection  
? Venue: 2021 IEEE Asia Pacific Conference on Circuits and Systems Apccas 2021 and 2021 IEEE Conference on Postgraduate Research in Microelectronics and Electronics Primeasia 2021  
? Year: 2021  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 3  
? Doi: 10.1109/Apccas51387.2021.9687805  
? Scopus ID: 2-s2.0-85126659039  
? Pages: 13-16  
? Authors: Rodovalho Luis Henrique; Rodrigues Cesar Ramos; Aiello Orazio  
? Keywords: CMOS inverter-based amplifiers | forward-body-biasing | improved composite transistors | rectangular transistor arrays | ultra-low-power | ultra-low-voltage  
? Source Id: 21101081706  
? Author Ids: 57190740930;22036272700;57212143527  
? Authoraffiliationids: 60017609;60017609;60017161  
? Corresponding: Rodovalho L.H.
52.  
? Title: A Two-Stage Single-Ended OTA with Improved Composite Transistors  
? Venue: 2021 IEEE Nordic Circuits and Systems Conference Norcas 2021 Proceedings  
? Year: 2021  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 3  
? DOI: 10.1109/NorCAS53631.2021.9599859  
? Scopus ID: 2-s2.0-85123503651  
? Authors: Rodovalho Luis Henrique; Rodrigues Cesar Ramos; Aiello Orazio  
? Keywords: Forward-body-biasing | Operational transconductance amplifier  
? Source Id: 21101073935  
? Author Ids: 57190740930;22036272700;57212143527  
? Authoraffiliationids: 60017609;60017609;60017161

? Corresponding: Rodovalho L.H.

53.

? Title: CMOS inverter linearization technique with active source degeneration  
? Venue: 2021 IEEE Nordic Circuits and Systems Conference Norcas 2021 Proceedings  
? Year: 2021  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 2  
? DOI: 10.1109/NorCAS53631.2021.9599643  
? Scopus ID: 2-s2.0-85123487350  
? Authors: Rodovalho Luis Henrique; Rodrigues Cesar Ramos; Aiello Orazio  
? Keywords: Forward body-biasing | Inverter-based OTAs | Ultra-low voltage  
? Source Id: 21101073935  
? Author Ids: 57190740930;22036272700;57212143527  
? Authoraffiliationids: 60017609;60017609;60017161  
? Corresponding: Rodovalho L.H.

54.

? Title: Design of an ultra-low voltage bias current generator highly immune to electromagnetic interference  
? Venue: Journal of Low Power Electronics and Applications  
? Year: 2021  
? Type: Journal  
? Subtype: Article  
? Citations: 2  
? DOI: 10.3390/jlpea11010006  
? Scopus ID: 2-s2.0-85100536737  
? eISSN: 20799268  
? Volume: 11  
? Issue: 1  
? Pages: 1-11  
? Authors: Aiello Orazio  
? Keywords: Current correlator | Current generators | Current mirrors | Current-splitter | Electromagnetic Interference (EMI) | Ultra-Low-Voltage (ULV) ICs  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q2, rank 355, percentile 64)  
2021:  
? Electrical and Electronic Engineering (Q2, rank 300, percentile 57)  
? Source Id: 21100332242  
? Author Ids: 57212143527  
? Authoraffiliationids: 60017161  
? Corresponding: Aiello O.

55.

? Title: Ultra-low-voltage inverter-based operational transconductance amplifiers with voltage gain enhancement by improved composite transistors  
? Venue: Electronics Switzerland  
? Year: 2020  
? Type: Journal  
? Subtype: Article  
? Citations: 46  
? DOI: 10.3390/electronics9091410  
? Scopus ID: 2-s2.0-85093881192  
? eISSN: 20799292  
? Volume: 9

? Issue: 9

? Pages: 1-16

? Authors: Rodovalho Luis Henrique; Aiello Orazio; Rodrigues Cesar Ramos

? Keywords: Composite transistors | Improved forward-body-bias | Inverter-based OTA | Operational transconductance amplifier (OTA) | Push-pull based OTA | Ultra-low-power (ULP) | Ultra-low-voltage (ULV)

? Quartile:

2025:

? Signal Processing (Q1, rank 36, percentile 81)

? Electrical and Electronic Engineering (Q1, rank 220, percentile 78)

? Control and Systems Engineering (Q1, rank 91, percentile 76)

? Computer Networks and Communications (Q1, rank 131, percentile 76)

? Hardware and Architecture (Q2, rank 62, percentile 73)

2020:

? Control and Systems Engineering (Q2, rank 123, percentile 52)

? Computer Networks and Communications (Q2, rank 161, percentile 51)

? Electrical and Electronic Engineering (Q2, rank 334, percentile 51)

? Signal Processing (Q3, rank 59, percentile 45)

? Hardware and Architecture (Q3, rank 94, percentile 40)

? Source Id: 21100829272

? Author Ids: 57190740930;57212143527;22036272700

? Authoraffiliationids: 60017609;60017161;60017609

? Corresponding: Rodovalho L.H.

56.

? Title: On the dc offset current generated during biphasic stimulation: Experimental study

? Venue: Electronics Switzerland

? Year: 2020

? Type: Journal

? Subtype: Article

? Citations: 6

? DOI: 10.3390/electronics9081198

? Scopus ID: 2-s2.0-85090688028

? eISSN: 20799292

? Volume: 9

? Issue: 8

? Pages: 1-14

? Authors: Aiello Orazio

? Keywords: Biphasic signal | DC offset current | Electrode stimulation | Platinum electrode matrix

? Quartile:

2025:

? Signal Processing (Q1, rank 36, percentile 81)

? Electrical and Electronic Engineering (Q1, rank 220, percentile 78)

? Control and Systems Engineering (Q1, rank 91, percentile 76)

? Computer Networks and Communications (Q1, rank 131, percentile 76)

? Hardware and Architecture (Q2, rank 62, percentile 73)

2020:

? Control and Systems Engineering (Q2, rank 123, percentile 52)

? Computer Networks and Communications (Q2, rank 161, percentile 51)

? Electrical and Electronic Engineering (Q2, rank 334, percentile 51)

? Signal Processing (Q3, rank 59, percentile 45)

? Hardware and Architecture (Q3, rank 94, percentile 40)

? Source Id: 21100829272

? Author Ids: 57212143527  
? Authoraffiliationids: 60017161  
? Corresponding: Aiello O.

57.

? Title: Electromagnetic susceptibility of battery management systems? ICs for electric vehicles: Experimental study  
? Venue: Electronics Switzerland  
? Year: 2020  
? Type: Journal  
? Subtype: Article  
? Citations: 36  
? DOI: 10.3390/electronics9030510  
? Scopus ID: 2-s2.0-85083219172  
? eISSN: 20799292  
? Volume: 9  
? Issue: 3  
? Authors: Aiello Orazio  
? Keywords: Anechoic chamber | Battery management system (BMS) | Direct power injection (DPI) | Electric vehicles (EVs) | Hybrid electric vehicles (HEVs) | IC-level EMC | Li-ion battery pack | Susceptibility to electromagnetic interference (EMI)

? Quartile:

2025:

? Signal Processing (Q1, rank 36, percentile 81)  
? Electrical and Electronic Engineering (Q1, rank 220, percentile 78)  
? Control and Systems Engineering (Q1, rank 91, percentile 76)  
? Computer Networks and Communications (Q1, rank 131, percentile 76)  
? Hardware and Architecture (Q2, rank 62, percentile 73)

2020:

? Control and Systems Engineering (Q2, rank 123, percentile 52)  
? Computer Networks and Communications (Q2, rank 161, percentile 51)  
? Electrical and Electronic Engineering (Q2, rank 334, percentile 51)  
? Signal Processing (Q3, rank 59, percentile 45)  
? Hardware and Architecture (Q3, rank 94, percentile 40)

? Source Id: 21100829272

? Author Ids: 57212143527

? Authoraffiliationids: 60012162

? Corresponding: Aiello O.

58.

? Title: Fully Digital Rail-to-Rail OTA with Sub-1000- $\mu$ m<sup>2</sup> Area, 250-mV Minimum Supply, and nW Power at 150-pF Load in 180 nm  
? Venue: IEEE Solid State Circuits Letters  
? Year: 2020  
? Type: Journal  
? Subtype: Article  
? Citations: 53  
? Doi: 10.1109/Lssc.2020.3027666  
? Scopus ID: 2-s2.0-85091926335  
? eISSN: 25739603  
? Volume: 3  
? Pages: 474-477  
? Authors: Toledo Pedro; Crovetti Paolo; Aiello Orazio; Alioto Massimo  
? Keywords: Energy harvesting | fully digital | operational transconductance amplifier (OTA) | ultralow power | ultralow voltage  
? Quartile:

2025:

? Electrical and Electronic Engineering (Q2, rank 405, percentile 59)

2020:

? Electrical and Electronic Engineering (Q3, rank 446, percentile 35)

? Source Id: 21100976126

? Author Ids: 56435887500;6506207582;57212143527;7004256085

? Authoraffiliationids: 60012162;60012162;60017161;60017161

? Corresponding: Toledo P.

59.

? Title: Fully synthesizable low-area analogue-to-digital converters with minimal design effort based on the dyadic digital pulse modulation

? Venue: IEEE Access

? Year: 2020

? Type: Journal

? Subtype: Article

? Citations: 49

? Doi: 10.1109/Access.2020.2986949

? Scopus ID: 2-s2.0-85084190088

? eISSN: 21693536

? Volume: 8

? Pages: 70890-70899

? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo

? Keywords: analog sensing Analog-to-digital converter (ADC) | Analog-to-digital converter (ADC) | current sensing | fully-digital | fully-synthesizable | low area | low design effort | standard cell design

? Quartile:

2025:

? Engineering (all) (Q1, rank 42, percentile 88)

? Computer Science (all) (Q1, rank 41, percentile 83)

? Materials Science (all) (Q1, rank 101, percentile 78)

2020:

? Engineering (all) (Q1, rank 39, percentile 87)

? Computer Science (all) (Q1, rank 43, percentile 81)

? Materials Science (all) (Q2, rank 135, percentile 70)

? Source Id: 21100374601

? Author Ids: 57212143527;6506207582;7004256085

? Authoraffiliationids: 60017161;60012162;60017161

? Corresponding: Aiello O.

60.

? Title: Minimum-effort design of ultra-low power interfaces for the internet of things

? Venue: 2019 26th IEEE International Conference on Electronics Circuits and Systems

Icecs 2019

? Year: 2019

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 7

? Doi: 10.1109/Icecs46596.2019.8965082

? Scopus ID: 2-s2.0-85079158631

? Pages: 105-106

? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo

? Keywords: Fully-synthesizable | Low area | Low design effort | Standard cell-based | Technology portable

? Source Id: 21100944554

? Author Ids: 57212143527;6506207582;7004256085

- ? Authoraffiliationids: 60012162-60017161;60012162;60017161  
? Corresponding: Aiello O.
61.  
? Title: Fully-synthesizable current-input ADCs for ultra-low area and minimal design effort  
? Venue: 2019 26th IEEE International Conference on Electronics Circuits and Systems Iicecs 2019  
? Year: 2019  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 9  
? Doi: 10.1109/Icecs46596.2019.8964789  
? Scopus ID: 2-s2.0-85079113462  
? Pages: 715-718  
? Authors: Aiello Orazio; Crovetti Paolo; Sharma Ayushparth; Alioto Massimo  
? Keywords: Analog-to-Digital Converter | Current sensing | Fully-synthesizable | Low area | Low design effort | Standard cell-based  
? Source Id: 21100944554  
? Author Ids: 57212143527;6506207582;57189657712;7004256085  
? Authoraffiliationids: 60012162-60017161;60012162;60017161;60017161  
? Corresponding: Aiello O.
62.  
? Title: Design of Relaxation Digital-to-Analog Converters for Internet of Things Applications in 40nm CMOS  
? Venue: Proceedings Apccas 2019 2019 IEEE Asia Pacific Conference on Circuits and Systems Innovative CAS Towards Sustainable Energy and Technology Disruption  
? Year: 2019  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 19  
? Doi: 10.1109/Apccas47518.2019.8953168  
? Scopus ID: 2-s2.0-85078703927  
? Pages: 13-16  
? Authors: Rubino Roberto; Crovetti Paolo S.; Aiello Orazio  
? Keywords: Digital to Analog Converter (DAC) | Fully Synthesizable DAC | Internet of Things | Relaxation Digital to Analog Converter (ReDAC) | Ultra Low Power  
? Source Id: 21100953610  
? Author Ids: 26425174900;6506207582;57212143527  
? Authoraffiliationids: 60012162;60012162;60012162-60017161  
? Corresponding: Rubino R.
63.  
? Title: Hall-effect current sensors susceptibility to EMI: Experimental study  
? Venue: Electronics Switzerland  
? Year: 2019  
? Type: Journal  
? Subtype: Article  
? Citations: 26  
? DOI: 10.3390/electronics8111310  
? Scopus ID: 2-s2.0-85074681392  
? eISSN: 20799292  
? Volume: 8  
? Issue: 11  
? Authors: Aiello Orazio  
? Keywords: Bulk current injection (BCI) test | Commercial current sensor | Direct

power injection (DPI) test | Electromagnetic compatibility (EMC) | Electromagnetic interference (EMI) | Hall-effect current sensors | Transverse-electromagnetic (TEM) test

? Quartile:

2025:

- ? Signal Processing (Q1, rank 36, percentile 81)
- ? Electrical and Electronic Engineering (Q1, rank 220, percentile 78)
- ? Control and Systems Engineering (Q1, rank 91, percentile 76)
- ? Computer Networks and Communications (Q1, rank 131, percentile 76)
- ? Hardware and Architecture (Q2, rank 62, percentile 73)

2019:

- ? Electrical and Electronic Engineering (Q3, rank 376, percentile 43)
- ? Computer Networks and Communications (Q3, rank 173, percentile 43)
- ? Control and Systems Engineering (Q3, rank 142, percentile 41)
- ? Signal Processing (Q3, rank 64, percentile 38)
- ? Hardware and Architecture (Q3, rank 109, percentile 30)

? Source Id: 21100829272

? Author Ids: 57212143527

? Authoraffiliationids: 60012162

? Corresponding: Aiello O.

64.

? Title: A 300mV-Supply Standard-Cell-Based OTA with Digital PWM Offset Calibration  
? Venue: 2019 IEEE Nordic Circuits and Systems Conference Norcas 2019 Norchip and International Symposium of System on Chip Soc 2019 Proceedings

? Year: 2019

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 25

? Doi: 10.1109/Norchip.2019.8906958

? Scopus ID: 2-s2.0-85076056751

? Authors: Toledo Pedro; Aiello Orazio; Crovetti Paolo S.

? Keywords: Digital Offset Calibration | Digital-Based OTA Circuit | Internet of Things (IoT) | Process variability | Ultra-Low Voltage (ULV)

? Source Id: 21100937454

? Author Ids: 56435887500;57212143527;6506207582

? Authoraffiliationids: 60012162-60006726;60012162-60017161;60012162

? Corresponding: Toledo P.

65.

? Title: Ultra-low voltage current biasing highly immune to EMI

? Venue: 2019 4th IEEE International Circuits and Systems Symposium Icsys 2019

? Year: 2019

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 0

? DOI: 10.1109/ICSyS47076.2019.8982461

? Scopus ID: 2-s2.0-85084282721

? Authors: Aiello Orazio

? Keywords: Current Correlator | Current Splitter | Electromagnetic Interference (EMI) | Subthreshold ICs | Ultra Low Voltage (ULV) current bias

? Source Id: 21100985385

? Author Ids: 57212143527

? Authoraffiliationids: 60012162

? Corresponding: Aiello O.

66.

? Title: Ultra-low power and minimal design effort interfaces for the internet of things: Invited paper  
? Venue: 2019 4th IEEE International Circuits and Systems Symposium Icsys 2019  
? Year: 2019  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 14  
? DOI: 10.1109/ICSys47076.2019.8982478  
? Scopus ID: 2-s2.0-85084279946  
? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo  
? Keywords: Digital-to-Analog Converter | Fully-synthesizable | low area | low design effort | standard cell-based | technology portable | Wake-up oscillator  
? Source Id: 21100985385  
? Author Ids: 57212143527;6506207582;7004256085  
? Authoraffiliationids: 60012162-60017161;60012162;60017161  
? Corresponding: Aiello O.

67.

? Title: Fully Synthesizable Low-Area Digital-to-Analog Converter with Graceful Degradation and Dynamic Power-Resolution Scaling  
? Venue: IEEE Transactions on Circuits and Systems I Regular Papers  
? Year: 2019  
? Type: Journal  
? Subtype: Article  
? Citations: 38  
? Doi: 10.1109/Tcsi.2019.2903464  
? Scopus ID: 2-s2.0-85067827146  
? Issn: 15498328  
? eISSN: 15580806  
? Volume: 66  
? Issue: 8  
? Pages: 2865-2875  
? Authors: Aiello Orazio; Crovetti Paolo Stefano; Alioto Massimo  
? Keywords: Digital-to-analog converter (DAC) | fully synthesizable | graceful degradation | power-resolution scaling  
? Quartile:

2025:

? Engineering (all) (Q1, rank 28, percentile 92)

2019:

? Subject (Q1, rank 105, percentile 84)

? Source Id: 11000153733

? Author Ids: 57212143527;6506207582;7004256085

? Authoraffiliationids: 60017161-60012162;60012162;60017161

? Corresponding: Aiello O.

68.

? Title: Breaking the boundaries between analogue and digital  
? Venue: Electronics Letters  
? Year: 2019  
? Type: Journal  
? Subtype: Article  
? Citations: 25  
? DOI: 10.1049/el.2019.1622  
? Scopus ID: 2-s2.0-85067796054  
? Issn: 00135194  
? Volume: 55

- ? Issue: 12  
? Pages: 672-673  
? Authors: Crovetti P. S.; Musolino F.; Aiello O.; Toledo P.; Rubino R.  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q3, rank 624, percentile 37)  
2019:  
? Electrical and Electronic Engineering (Q2, rank 236, percentile 64)  
? Source Id: 24918  
? Author Ids: 6506207582;6506815932;57212143527;56435887500;26425174900  
? Authoraffiliationids: 60012162;60012162;60012162;60012162;60012162  
? Corresponding: Crovetti P.S.
69.  
? Title: A pW-Power Hz-Range Oscillator Operating With a 0.3-1.8-V Unregulated Supply  
? Venue: IEEE Journal of Solid State Circuits  
? Year: 2019  
? Type: Journal  
? Subtype: Article  
? Citations: 54  
? Doi: 10.1109/JSSC.2018.2886336  
? Scopus ID: 2-s2.0-85065060653  
? Issn: 00189200  
? eISSN: 1558173X  
? Volume: 54  
? Issue: 5  
? Pages: 1487-1496  
? Authors: Aiello Orazio; Crovetti Paolo; Lin Longyang; Alioto Massimo  
? Keywords: Internet of Things (IoT) | pW power | relaxation oscillator | ultra-low-power logic style  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q1, rank 82, percentile 91)  
2019:  
? Electrical and Electronic Engineering (Q1, rank 58, percentile 91)  
? Source Id: 17278  
? Author Ids: 57212143527;6506207582;57193750534;7004256085  
? Authoraffiliationids: 60017161-60012162;60012162;60017161;60017161  
? Corresponding: Aiello O.
70.  
? Title: Standard Cell-Based Ultra-Compact DACs in 40-nm CMOS  
? Venue: IEEE Access  
? Year: 2019  
? Type: Journal  
? Subtype: Article  
? Citations: 36  
? Doi: 10.1109/Access.2019.2938737  
? Scopus ID: 2-s2.0-85072578940  
? eISSN: 21693536  
? Volume: 7  
? Pages: 126479-126488  
? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo  
? Keywords: Automated design | Calibration | Digital to analog converter (DAC) | Fully digital | Fully synthesizable | Standard-cell-based analog circuits | Ultra-low design effort

? Quartile:

2025:

? Engineering (all) (Q1, rank 42, percentile 88)

? Computer Science (all) (Q1, rank 41, percentile 83)

? Materials Science (all) (Q1, rank 101, percentile 78)

2019:

? Engineering (all) (Q1, rank 47, percentile 84)

? Computer Science (all) (Q1, rank 45, percentile 79)

? Materials Science (all) (Q2, rank 155, percentile 66)

? Source Id: 21100374601

? Author Ids: 57212143527;6506207582;7004256085

? Authoraffiliationids: 60012162-60017161;60012162;60017161

? Corresponding: Aiello O.

71.

? Title: Wake-up oscillators with PW power consumption in dynamic leakage suppression logic

? Venue: Proceedings IEEE International Symposium on Circuits and Systems

? Year: 2019

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 15

? Doi: 10.1109/Iscas.2019.8702365

? Scopus ID: 2-s2.0-85066814569

? Issn: 02714310

? Volume: 2019-May

? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo

? Keywords: Dynamic Leakage Suppression logic | Internet of Things | PW-power | Relaxation oscillator | Wake-up oscillator

? Quartile:

2025:

? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)

2019:

? Electrical and Electronic Engineering (Q3, rank 388, percentile 42)

? Source Id: 56190

? Author Ids: 57212143527;6506207582;7004256085

? Authoraffiliationids: 60012162-60017161;60012162;60017161

? Corresponding: Aiello O.

72.

? Title: A Sub-Leakage PW-Power Hz-Range Relaxation Oscillator Operating with 0.3V-1.8V Unregulated Supply

? Venue: IEEE Symposium on VLSI Circuits Digest of Technical Papers

? Year: 2018

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 22

? Doi: 10.1109/Vlsic.2018.8502413

? Scopus ID: 2-s2.0-85056811140

? Volume: 2018-June

? Pages: 119-120

? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo

? Source Id: 68673

? Author Ids: 57212143527;6506207582;7004256085

? Authoraffiliationids: 60017161-60012162;60012162;60017161

? Corresponding: Aiello O.

73.

? Title: Fully Synthesizable, Rail-to-Rail Dynamic Voltage Comparator for Operation down to 0.3 v  
? Venue: Proceedings IEEE International Symposium on Circuits and Systems  
? Year: 2018  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 41  
? Doi: 10.1109/lscas.2018.8351106  
? Scopus ID: 2-s2.0-85057087886  
? ISSN: 02714310  
? Volume: 2018-May  
? Authors: Aiello Orazio; Crovetti Paolo; Alioto Massimo  
? Keywords: Dynamic voltage comparator | fully synthesizable | standard-cell design | ultra-low voltage  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q3, rank 652, percentile 34)  
2018:  
? Electrical and Electronic Engineering (Q3, rank 382, percentile 42)  
? Source Id: 56190  
? Author Ids: 57212143527;6506207582;7004256085  
? Authoraffiliationids: 60017161;60012162;60017161  
? Corresponding: Aiello O.

74.

? Title: Reliability of integrated overtemperature sensors in electromagnetic polluted environment  
? Venue: Technologies for Smart Sensors and Sensor Fusion  
? Year: 2017  
? Type: Book  
? Subtype: Book Chapter  
? Citations: 0  
? DOI: 10.1201/b16746  
? Scopus ID: 2-s2.0-85051967553  
? Pages: 437-449  
? Authors: Aiello Orazio; Fiori Franco  
? Source Id: 21100873850  
? Author Ids: 57212143527;7006940893  
? Authoraffiliationids: 60012162;60012162  
? Corresponding: Aiello O.

75.

? Title: Instrumented flexible active electrode matrix suitable for human computer interface applications  
? Venue: Biomedical Physics and Engineering Express  
? Year: 2016  
? Type: Journal  
? Subtype: Article  
? Citations: 2  
? Doi: 10.1088/2057-1976/2/3/035020  
? Scopus ID: 2-s2.0-85046241880  
? eISSN: 20571976  
? Volume: 2  
? Issue: 3  
? Authors: Aiello Orazio; Gargiulo Gaetano; McEwan Alistair

? Keywords: Bio-potential multi-channels acquisition systems | Biomedical and humancomputer applications | Biopotential recording | Flexible active electrode matrix | Scaled electrodes | Wearable devices

? Quartile:

2025:

? Nursing (all) (Q2, rank 54, percentile 62)

2016:

? Nursing (all) (Q3, rank 53, percentile 45)

? Source Id: 21100788266

? Author Ids: 57212143527;7005046530;14016086300

? Authoraffiliationids: 60017161;60017803;60090755

? Corresponding: Aiello O.

76.

? Title: Design of a neural recording amplifier robust to EMI

? Venue: 2013 Asia Pacific Symposium on Electromagnetic Compatibility Apemc 2013

? Year: 2015

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 4

? Doi: 10.1109/Apemc.2013.7360665

? Scopus ID: 2-s2.0-85002306648

? Authors: Aiello Orazio; Redoute Jean Michel

? Source Id: 21100788230

? Author Ids: 57212143527;9132437300

? Authoraffiliationids: 60012162;60019578

? Corresponding: Aiello O.

77.

? Title: Susceptibility to EMI of a Battery Management System IC for electric vehicles

? Venue: IEEE International Symposium on Electromagnetic Compatibility

? Year: 2015

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 31

? Doi: 10.1109/Isemc.2015.7256257

? Scopus ID: 2-s2.0-84953853695

? Issn: 10774076

? eISSN: 21581118

? Volume: 2015-Septmber

? Pages: 749-754

? Authors: Aiello Orazio; Crovetti Paolo S.; Fiori Franco

? Keywords: Anechoic Chamber | Battery Management System (BMS) | Direct Power Injection (DPI) | Electric Vehicles (EVs) | Hybrid Electric Vehicles (HEVs) | IC-level EMC | Li-ion Battery Pack | Susceptibility to Electromagnetic Interference (EMI)

? Source Id: 17274

? Author Ids: 57212143527;6506207582;7006940893

? Authoraffiliationids: 60027905;60012162;60012162

? Corresponding: Aiello O.

78.

? Title: Current sensing circuit for DC-DC converters based on the miller effect

? Venue: International Conference on Applied Electronics

? Year: 2013

? Type: Conference Proceeding

? Subtype: Conference Paper

? Citations: 6

? Scopus ID: 2-s2.0-84890528719  
? Issn: 18037232  
? Authors: Aiello Orazio; Fiori Franco  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q4, rank 822, percentile 17)  
? Source Id: 20500195429  
? Author Ids: 57212143527;7006940893  
? Authoraffiliationids: 60012162;60012162  
? Corresponding: Aiello O.

79.  
? Title: Design of a temperature-compensated CMOS relaxation oscillator  
? Venue: International Conference on Applied Electronics  
? Year: 2013  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Scopus ID: 2-s2.0-84890447597  
? Issn: 18037232  
? Authors: Aiello Orazio  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q4, rank 822, percentile 17)  
? Source Id: 20500195429  
? Author Ids: 57212143527  
? Authoraffiliationids: 60012162  
? Corresponding: Aiello O.

80.  
? Title: A new MagFET-based integrated current sensor highly immune to EMI  
? Venue: Microelectronics Reliability  
? Year: 2013  
? Type: Journal  
? Subtype: Article  
? Citations: 20  
? DOI: 10.1016/j.microrel.2012.10.013  
? Scopus ID: 2-s2.0-84875521166  
? Issn: 00262714  
? Volume: 53  
? Issue: 4  
? Pages: 573-581  
? Authors: Aiello Orazio; Fiori Franco  
? Quartile:  
2025:  
? Safety, Risk, Reliability and Quality (Q2, rank 84, percentile 67)  
? Electrical and Electronic Engineering (Q2, rank 361, percentile 63)  
? Condensed Matter Physics (Q2, rank 202, percentile 54)  
? Surfaces, Coatings and Films (Q2, rank 63, percentile 54)  
? Atomic and Molecular Physics, and Optics (Q2, rank 109, percentile 54)  
? Electronic, Optical and Magnetic Materials (Q2, rank 153, percentile 50)  
2013:  
? Safety, Risk, Reliability and Quality (Q1, rank 23, percentile 81)  
? Electrical and Electronic Engineering (Q2, rank 181, percentile 71)  
? Surfaces, Coatings and Films (Q2, rank 28, percentile 71)  
? Atomic and Molecular Physics, and Optics (Q2, rank 52, percentile 66)

- ? Electronic, Optical and Magnetic Materials (Q2, rank 75, percentile 62)
  - ? Condensed Matter Physics (Q2, rank 146, percentile 62)
  - ? Source Id: 26717
  - ? Author Ids: 57212143527;7006940893
  - ? Authoraffiliationids: 60012162;60012162
  - ? Corresponding: Aiello O.
- 81.
- ? Title: A new mirroring circuit for power MOS current sensing highly immune to EMI
  - ? Venue: Sensors Switzerland
  - ? Year: 2013
  - ? Type: Journal
  - ? Subtype: Article
  - ? Citations: 20
  - ? DOI: 10.3390/s130201856
  - ? Scopus ID: 2-s2.0-84875178318
  - ? Issn: 14248220
  - ? Volume: 13
  - ? Issue: 2
  - ? Pages: 1856-1871
  - ? Authors: Aiello Orazio; Fiori Franco
  - ? Keywords: CMOS integrated circuit | Current sensor | Electromagnetic compatibility (EMC) | Electromagnetic interference (EMI) | Miller effect | SenseFET | Smart power
  - ? Quartile:
- 2025:
- ? Instrumentation (Q1, rank 19, percentile 90)
  - ? Electrical and Electronic Engineering (Q1, rank 136, percentile 86)
  - ? Atomic and Molecular Physics, and Optics (Q1, rank 36, percentile 85)
  - ? Biochemistry (Q1, rank 72, percentile 84)
  - ? Information Systems (Q1, rank 87, percentile 82)
  - ? Analytical Chemistry (Q1, rank 30, percentile 82)
- 2013:
- ? Atomic and Molecular Physics, and Optics (Q1, rank 27, percentile 82)
  - ? Electrical and Electronic Engineering (Q1, rank 114, percentile 82)
  - ? Analytical Chemistry (Q2, rank 36, percentile 62)
  - ? Biochemistry (Q2, rank 180, percentile 51)
- ? Source Id: 130124
  - ? Author Ids: 57212143527;7006940893
  - ? Authoraffiliationids: 60012162;60012162
  - ? Corresponding: Aiello O.
- 82.
- ? Title: A new current sensor based on the Miller effect highly immune to EMI
  - ? Venue: Cccccc2012 Asia Pacific Symposium on Electromagnetic Compatibility Apemc 2012 Proceedings
  - ? Year: 2012
  - ? Type: Conference Proceeding
  - ? Subtype: Conference Paper
  - ? Citations: 1
  - ? Doi: 10.1109/Apemc.2012.6238001
  - ? Scopus ID: 2-s2.0-84864854553
  - ? Pages: 69-72
  - ? Authors: Aiello Orazio; Fiori Franco
  - ? Source Id: 21100208078
  - ? Author Ids: 57212143527;7006940893
  - ? Authoraffiliationids: 60012162;60012162

- ? Corresponding: Aiello O.  
83.  
? Title: On the susceptibility of embedded thermal shutdown circuit to radio frequency interference  
? Venue: IEEE Transactions on Electromagnetic Compatibility  
? Year: 2012  
? Type: Journal  
? Subtype: Article  
? Citations: 17  
? Doi: 10.1109/Temc.2011.2169964  
? Scopus ID: 2-s2.0-84860192091  
? Issn: 00189375  
? Volume: 54  
? Issue: 2  
? Pages: 405-412  
? Authors: Aiello Orazio; Fiori Franco  
? Keywords: CMOS integrated circuits (ICs) | distortion | electromagnetic interference (EMI) | power semiconductor devices | temperature measurement  
? Quartile:  
2025:  
? Electrical and Electronic Engineering (Q2, rank 303, percentile 69)  
? Condensed Matter Physics (Q2, rank 151, percentile 66)  
? Atomic and Molecular Physics, and Optics (Q2, rank 83, percentile 65)  
2012:  
? Electrical and Electronic Engineering (Q1, rank 90, percentile 85)  
? Atomic and Molecular Physics, and Optics (Q1, rank 23, percentile 84)  
? Condensed Matter Physics (Q1, rank 64, percentile 83)  
? Source Id: 26051  
? Author Ids: 57212143527;7006940893  
? Authoraffiliationids: 60012162;60012162  
? Corresponding: Aiello O.  
84.  
? Title: Investigation on the susceptibility of hall-effect current sensors to EMI  
? Venue: Proceedings of EMC Europe 2011 York 10th International Symposium on Electromagnetic Compatibility  
? Year: 2011  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 15  
? Scopus ID: 2-s2.0-83155163797  
? Pages: 368-372  
? Authors: Aiello Orazio; Crovetti Paolo; Fiori Franco  
? Source Id: 20700195003  
? Author Ids: 57212143527;6506207582;7006940893  
? Authoraffiliationids: 60012162;60012162;60012162  
? Corresponding: Aiello O.  
85.  
? Title: A new current sensor based on MagFET highly immune to EMI  
? Venue: Proceedings of the 2009 International Conference on Electromagnetics in Advanced Applications Iiceaa 09  
? Year: 2009  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 4

? Doi: 10.1109/Iceaa.2009.5297310  
? Scopus ID: 2-s2.0-72849114479  
? Pages: 784-787  
? Authors: Aiello O.; Fiori F.  
? Source Id: 19500157425  
? Author Ids: 57212143527;7006940893  
? Authoraffiliationids: 60085203;60012162  
? Corresponding: Aiello O.

86.

? Title: STDP with adaptive synaptic delay for robot navigation control  
? Venue: Proceedings of SPIE the International Society for Optical Engineering  
? Year: 2007  
? Type: Conference Proceeding  
? Subtype: Conference Paper  
? Citations: 0  
? Doi: 10.1117/12.724204  
? Scopus ID: 2-s2.0-36248941921  
? Issn: 0277786x  
? Volume: 6592  
? Authors: Arena Paolo; Patan^ Luca; Distefano Francesco; Bucolo Sebastiano; Aiello Orazio  
? Keywords: Hexapod robot | STDP | Visual cue-based navigation  
? Quartile:  
2025:  
? Instrumentation (Q4, rank 157, percentile 16)  
? Electrical and Electronic Engineering (Q4, rank 873, percentile 12)  
? Computer Science Applications (Q4, rank 893, percentile 9)  
? Applied Mathematics (Q4, rank 625, percentile 6)  
? Electronic, Optical and Magnetic Materials (Q4, rank 294, percentile 5)  
? Condensed Matter Physics (Q4, rank 425, percentile 4)  
? Source Id: 40067  
? Author Ids: 23003603300;6603946091;23004222200;23003779100;57212143527  
? Authoraffiliationids:  
60010146;60010146;60010146-60083732;60010146-60083732;60010146-60083732  
? Corresponding: Arena P.