

# Wei Cao

## List of Publications by Year in descending order

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Version: 2024-02-01

43  
papers

988  
citations

567281

15  
h-index

677142

22  
g-index

44  
all docs

44  
docs citations

44  
times ranked

1156  
citing authors

| #  | ARTICLE  | IF  | CITATIONS |
|----|--|-----|-----------|
| 1  | Ge Ion Implanted Photonic Devices and Annealing for Emerging Applications. <i>Micromachines</i> , 2022, 13, 291.   | 2.9 | 2         |
| 2  | Group IV mid-infrared photonics for communications and sensing. , 2022, , .  |     | 0         |
| 3  | Mid-infrared silicon-on-insulator waveguides with single-mode propagation over an octave of frequency. <i>Optics Express</i> , 2022, 30, 8560.   | 3.4 | 5         |
| 4  | Nanometallic antenna-assisted amorphous silicon waveguide integrated bolometer for mid-infrared. <i>Optics Letters</i> , 2021, 46, 677.  | 3.3 | 17        |
| 5  | High-speed silicon Michelson interferometer modulator and streamlined IMDD PAM-4 transmission of Mach-Zehnder modulators for the 2 $\mu$ m wavelength band. <i>Optics Express</i> , 2021, 29, 14438. | 3.4 | 9         |
| 6  | A Si Optical Modulator Based on Fano-Like Resonance. <i>IEEE Photonics Technology Letters</i> , 2021, 33, 1209-1212.   | 2.5 | 6         |
| 7  | Thick BaTiO <sub>3</sub> Epitaxial Films Integrated on Si by RF Sputtering for Electro-Optic Modulators in Si Photonics. <i>ACS Applied Materials &amp; Interfaces</i> , 2021, 13, 51230-51244.      | 8.0 | 20        |
| 8  | Photodetection at 3.8 $\mu$ m Using Intrinsic Monolithic Integrated Germanium Photodiodes. , 2021, , .   |     | 1         |
| 9  | CORNERSTONE™s Silicon Photonics Rapid Prototyping Platforms: Current Status and Future Outlook. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 8201.  | 2.5 | 23        |
| 10 | Electronic-photonic convergence for silicon photonics transmitters beyond 100 Gbps on- $\mu$ s off keying. <i>Optica</i> , 2020, 7, 1514.  | 9.3 | 47        |
| 11 | 25 Gbit/s silicon based modulators for the 2 $\mu$ m wavelength band. , 2020, , .  |     | 1         |
| 12 | Investigations into group IV photonic waveguides with a wide working optical bandwidth. , 2020, , .  |     | 1         |
| 13 | Silicon Optical Modulators for Data Transmission in Different Wavelength Bands. , 2019, , .  |     | 0         |
| 14 | Mid-Infrared Silicon Waveguide-Based Bolometer. , 2019, , .  |     | 0         |
| 15 | Mid-Infrared Nanometallic Antenna Assisted Silicon Waveguide Based Bolometers. <i>ACS Photonics</i> , 2019, 6, 3253-3260.  | 6.6 | 27        |
| 16 | High Speed Silicon Capacitor Modulators for TM Polarisation. , 2019, , .   |     | 0         |
| 17 | Suspended Silicon Integrated Platform for the Long-Wavelength Mid-Infrared Band. , 2019, , .   |     | 0         |
| 18 | Mid-infrared suspended waveguide platform and building blocks. <i>IET Optoelectronics</i> , 2019, 13, 55-61.   | 3.3 | 21        |

| #  | ARTICLE  | IF  | CITATIONS |
|----|--|-----|-----------|
| 19 | Experimental quantification of the free-carrier effect in silicon waveguides at extended wavelengths. Optics Express, 2019, 27, 166.                         | 3.4 | 3         |
| 20 | Silicon-on-insulator free-carrier injection modulators for the mid-infrared. Optics Letters, 2019, 44, 915.  | 3.3 | 26        |
| 21 | Ge-on-Si modulators operating at mid-infrared wavelengths up to $8\ \mu\text{m}$ . Photonics Research, 2019, 7, 8280   |     | 36        |
| 22 | Ion Implantation in Silicon for Trimming the Operating Wavelength of Ring Resonators. IEEE Journal of Selected Topics in Quantum Electronics, 2018, 24, 1-7. | 2.9 | 53        |
| 23 | Co-Design of Electronics and Photonics Components for Silicon Photonics Transmitters. , 2018, , .  |     | 8         |
| 24 | 20-Gb/s Silicon Optical Modulators for the $2\ \mu\text{m}$ Wavelength Band. , 2018, , .   |     | 1         |
| 25 | Silicon and Germanium Mid-Infrared Optical Modulators. , 2018, , .   |     | 1         |
| 26 | High-speed silicon modulators for the $2\ \mu\text{m}$ wavelength band. Optica, 2018, 5, 1055.   | 9.3 | 119       |
| 27 | Suspended silicon waveguides for long-wave infrared wavelengths. Optics Letters, 2018, 43, 795.  | 3.3 | 79        |
| 28 | Group IV mid-infrared photonics [Invited]. Optical Materials Express, 2018, 8, 2276.   | 3.0 | 34        |
| 29 | Waveguide integrated graphene mid-infrared photodetector. , 2018, , .  |     | 9         |
| 30 | Advancing silicon photonics by germanium ion implantation into silicon. , 2018, , .  |     | 1         |
| 31 | All silicon approach to modulation and detection at $\lambda = 2\ \mu\text{m}$ . , 2018, , .   |     | 1         |
| 32 | Group IV mid-infrared devices and circuits. , 2018, , .  |     | 0         |
| 33 | Towards autonomous testing of photonic integrated circuits. Proceedings of SPIE, 2017, , .   | 0.8 | 1         |
| 34 | Ion implantation in silicon to facilitate testing of photonic circuits. , 2017, , .  |     | 0         |
| 35 | Germanium Mid-Infrared Photonic Devices. Journal of Lightwave Technology, 2017, 35, 624-630.   | 4.6 | 76        |
| 36 | Germanium and silicon photonic integrated circuits for the mid-infrared. , 2017, , .   |     | 0         |

| #  | ARTICLE   | IF   | CITATIONS |
|----|---|------|-----------|
| 37 | Multipurpose silicon photonics signal processor core. Nature Communications, 2017, 8, 636.              | 12.8 | 308       |
| 38 | Mid-infrared Ge-on-Si electro-absorption modulator. , 2017, , .   |      | 2         |
| 39 | Silicon Photonics Rectangular Universal Interferometer. Laser and Photonics Reviews, 2017, 11, 1700219. | 8.7  | 37        |
| 40 | Compact programmable RF-photonics filters using integrated waveguide mesh processors. , 2017, , .       |      | 1         |
| 41 | Ion implantation in silicon for photonic device trimming. , 2017, , .                                   |      | 0         |
| 42 | Silicon RF-Photonics Processor Reconfigurable Core. , 2017, , .   |      | 0         |
| 43 | Integrated RF-photonics delay lines using reconfigurable photonic waveguide meshes. , 2017, , .         |      | 2         |