# Tong Sun

List of Publications by Year
in descending order

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| 256 | 6,689 | 87843 38 | 79644 73 |
|---|---|---|---|
| papers | citations | h-index | g-index |

| 258 | 258 | 258 | 6340 |
|---|---|---|---|
| all docs | docs citations | times ranked | citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Fiber optic sensor technology: an overview. Sensors and Actuators A: Physical, 2000, 82, 40-61. | 2.0 | 719 |
| 2 | Gold nanorod-based localized surface plasmon resonance biosensors: A review. Sensors and Actuators B: Chemical, 2014, 195, 332-351. | 4.0 | 604 |
| 3 | Fibre-optic sensor technologies for humidity and moisture measurement. Sensors and Actuators A: Physical, 2008, 144, 280-295. | 2.0 | 401 |
| 4 | Comparison of fluorescence-based temperature sensor schemes: Theoretical analysis and experimental validation. Journal of Applied Physics, 1998, 84, 4649-4654. | 1.1 | 289 |
| 5 | Characterisation of a polymer-coated fibre Bragg grating sensor for relative humidity sensing. Sensors and Actuators B: Chemical, 2005, 110, 148-156. | 4.0 | 228 |
| 6 | Wavelength-based localized surface plasmon resonance optical fiber biosensor. Sensors and Actuators B: Chemical, 2013, 181, 611-619. | 4.0 | 130 |
| 7 | Fluorescence based fibre optic pH sensor for the pH 10â€“13 range suitable for corrosion monitoring in concrete structures. Sensors and Actuators B: Chemical, 2014, 191, 498-507. | 4.0 | 122 |
| 8 | Long period grating-based humidity sensor for potential structural health monitoring. Sensors and Actuators A: Physical, 2008, 148, 57-62. | 2.0 | 115 |
| 9 | Polymer-coated fiber Bragg grating for relative humidity sensing. IEEE Sensors Journal, 2005, 5, 1082-1089. | 2.4 | 114 |
| 10 | Optimization of gold-nanoparticle-based optical fibre surface plasmon resonance (SPR)-based sensors. Sensors and Actuators B: Chemical, 2012, 164, 43-53. | 4.0 | 85 |
| 11 | Silver@graphene oxide nanocomposite-based optical sensor platform for biomolecules. RSC Advances, 2015, 5, 17809-17816. | 1.7 | 83 |
| 12 | LPG-Based PVA Coated Sensor for Relative Humidity Measurement. IEEE Sensors Journal, 2008, 8, 1093-1098. | 2.4 | 72 |
| 13 | Novel Negative Pressure Wave-Based Pipeline Leak Detection System Using Fiber Bragg Grating-Based Pressure Sensors. Journal of Lightwave Technology, 2017, 35, 3366-3373. | 2.7 | 72 |
| 14 | LSPR optical fibre sensors based on hollow gold nanostructures. Sensors and Actuators B: Chemical, 2014, 191, 37-44. | 4.0 | 70 |
| 15 | [INVITED] Developments in optical fibre sensors for industrial applications. Optics and Laser Technology, 2016, 78, 62-66. | 2.2 | 70 |
| 16 | New Test Method to Obtain pH Profiles due to Carbonation of Concretes Containing Supplementary Cementitious Materials. Journal of Materials in Civil Engineering, 2007, 19, 936-946. | 1.3 | 69 |
| 17 | A gold nanorod-based localized surface plasmon resonance platform for the detection of environmentally toxic metal ions. Analyst, The, 2015, 140, 2540-2555. | 1.7 | 64 |
| 18 | Fibre optic long period grating-based humidity sensor probe using a Michelson interferometric arrangement. Sensors and Actuators B: Chemical, 2013, 178, 694-699. | 4.0 | 63 |

| # | Article | IF | Citations |
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| 19 | Analysis of Polyimide-Coated Optical Fiber Long-Period Grating-Based Relative Humidity Sensor. IEEE Sensors Journal, 2013, 13, 767-771. | 2.4 | 62 |
| 20 | Graphene-Oxide-Coated Long-Period Grating-Based Fiber Optic Sensor for Relative Humidity and External Refractive Index. Journal of Lightwave Technology, 2018, 36, 1145-1151. | 2.7 | 62 |
| 21 | Simultaneous Measurement of Strain and Temperature With a Few-Mode Fiber-Based Sensor. Journal of Lightwave Technology, 2018, 36, 2796-2802. | 2.7 | 60 |
| 22 | Multi-axis force sensors: A state-of-the-art review. Sensors and Actuators A: Physical, 2020, 304, 111772. | 2.0 | 58 |
| 23 | Obtaining progressive chloride profiles in cementitious materials. Construction and Building Materials, 2005, 19, 666-673. | 3.2 | 52 |
| 24 | Cross-Comparison of Surface Plasmon Resonance-Based Optical Fiber Sensors With Different Coating Structures. IEEE Sensors Journal, 2012, 12, 2355-2361. | 2.4 | 51 |
| 25 | Temperature dependence of the fluorescence lifetime in Pr3+:ZBLAN glass for fiber optic thermometry. Review of Scientific Instruments, 1997, 68, 3447-3451. | 0.6 | 49 |
| 26 | Bragg Grating-Based Fiber-Optic Laser Probe for Temperature Sensing. IEEE Photonics Technology Letters, 2004, 16, 218-220. | 1.3 | 49 |
| 27 | Intrinsic Fluorescence-Based Optical Fiber Sensor for Cocaine Using a Molecularly Imprinted Polymer as the Recognition Element. IEEE Sensors Journal, 2012, 12, 255-260. | 2.4 | 49 |
| 28 | Characteristics of potential fibre Bragg grating sensor-based devices at elevated temperatures. Measurement Science and Technology, 2003, 14, 1131-1136. | 1.4 | 48 |
| 29 | Demonstration of a fibre-optic sensing technique for the measurement of moisture absorption in concrete. Smart Materials and Structures, 2006, 15, N40-N45. | 1.8 | 47 |
| 30 | Effective surface modification of gold nanorods for localized surface plasmon resonance-based biosensors. Sensors and Actuators B: Chemical, 2012, 169, 360-367. | 4.0 | 46 |
| 31 | Preparation of novel optical fibre-based Cocaine sensors using a molecular imprinted polymer approach. Sensors and Actuators B: Chemical, 2014, 193, 35-41. | 4.0 | 44 |
| 32 | Intrinsic Fiber Optic pH Sensor for Measurement of pH Values in the Range of 0.5â€“6. IEEE Sensors Journal, 2016, 16, 881-887. | 2.4 | 43 |
| 33 | Non-linear temperature dependence of Bragg gratings written in different fibres, optimised for sensor applications over a wide range of temperatures. Sensors and Actuators A: Physical, 2004, 112, 211-219. | 2.0 | 42 |
| 34 | Short cavity single frequency fiber laser for in-situ sensing applications over a wide temperature range. Optics Express, 2007, 15, 363. | 1.7 | 42 |
| 35 | Characterization of erbium-doped intrinsic optical fiber sensor probes at high temperatures. Review of Scientific Instruments, 1998, 69, 2924-2929. | 0.6 | 41 |
| 36 | Sewerage tunnel leakage detection using a fibre optic moisture-detecting sensor system. Sensors and Actuators A: Physical, 2014, 220, 62-68. | 2.0 | 41 |

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| 37 | Fluorescence decay-time characteristics of erbium-doped optical fiber at elevated temperatures. Review of Scientific Instruments, 1997, 68, 2764-2766. | 0.6 | 40 |
| 38 | Strain Measurement on a Rail Bridge Loaded to Failure Using a Fiber Bragg Grating-Based Distributed Sensor System. IEEE Sensors Journal, 2008, 8, 2059-2065. | 2.4 | 40 |
| 39 | Design and in-the-field performance evaluation of compact FBG sensor system for structural health monitoring applications. Sensors and Actuators A: Physical, 2009, 151, 107-112. | 2.0 | 38 |
| 40 | Temperature and nonlinearity corrections for a photodiode array spectrometer used in the field. Applied Optics, 2011, 50, 866. | 2.1 | 38 |
| 41 | â€œAll-fiberâ€•tunable laser in the 2ÂÎ¼m region, designed for CO<sub>2</sub> detection. Applied Optics, 2012, 51, 7011. | 0.9 | 37 |
| 42 | Optimization of a long-period grating-based Machâ€“Zehnder interferometer for temperature measurement. Optics Communications, 2007, 272, 15-21. | 1.0 | 36 |
| 43 | Optical Fiber Refractive Index Sensor for Chloride Ion Monitoring. IEEE Sensors Journal, 2009, 9, 525-532. | 2.4 | 35 |
| 44 | Optical Fiber-Based Heavy Metal Detection Using the Localized Surface Plasmon Resonance Technique. IEEE Sensors Journal, 2019, 19, 8720-8726. | 2.4 | 35 |
| 45 | Lithium-Ion Battery State-of-Charge Estimator Based on FBG-Based Strain Sensor and Employing Machine Learning. IEEE Sensors Journal, 2021, 21, 1453-1460. | 2.4 | 35 |
| 46 | Evaluation of the Durability and Performance of FBG-Based Sensors for Monitoring Moisture in an Aggressive Gaseous Waste Sewer Environment. Journal of Lightwave Technology, 2017, 35, 3380-3386. | 2.7 | 33 |
| 47 | Ytterbium-based fluorescence decay time fiber optic temperature sensor systems. Review of Scientific Instruments, 1998, 69, 4179-4185. | 0.6 | 30 |
| 48 | Erbium/ytterbium fluorescence based fiber optic temperature sensor system. Review of Scientific Instruments, 2000, 71, 4017. | 0.6 | 30 |
| 49 | Strain and temperature effects on erbium-doped fiber for decay-time based sensing. Review of Scientific Instruments, 2000, 71, 104-108. | 0.6 | 30 |
| 50 | Analysis of thermal decay and prediction of operational lifetime for a type I boron-germanium codoped Fiber Bragg grating. Applied Optics, 2003, 42, 2188. | 2.1 | 30 |
| 51 | Morphology and Thermal Stability of Fiber Bragg Gratings for Sensor Applications Written in ${m H}_{2}$-Free and ${m H}_{2}$-Loaded Fibers by Femtosecond Laser. IEEE Sensors Journal, 2010, 10, 1675-1681. | 2.4 | 30 |
| 52 | Study of reliability of fibre Bragg grating fibre optic strain sensors for field-test applications. Sensors and Actuators A: Physical, 2012, 185, 8-16. | 2.0 | 30 |
| 53 | SPR-Based Optical Fiber Sensors Using Goldâ€“Silver Alloy Particles as the Active Sensing Material. IEEE Sensors Journal, 2013, 13, 2192-2199. | 2.4 | 30 |
| 54 | Commissioning and Evaluation of a Fiber-Optic Sensor System for Bridge Monitoring. IEEE Sensors Journal, 2013, 13, 2555-2562. | 2.4 | 30 |

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| 55 | Monitoring of Corrosion in Structural Reinforcing Bars: Performance Comparison Using In Situ Fiber-Optic and Electric Wire Strain Gauge Systems. IEEE Sensors Journal, 2009, 9, 1494-1502. | 2.4 | 29 |
| 56 | Ytterbium-sensitized Thulium-doped fiber laser in the near-IR with 980 nm pumping. Optics Express, 2010, 18, 5068. | 1.7 | 29 |
| 57 | Building Stone Condition Monitoring Using Specially Designed Compensated Optical Fiber Humidity Sensors. IEEE Sensors Journal, 2012, 12, 1011-1017. | 2.4 | 29 |
| 58 | Wavelength dependent pH optical sensor using the layer-by-layer technique. Sensors and Actuators B: Chemical, 2012, 169, 374-381. | 4.0 | 29 |
| 59 | Investigations on exponential lifetime measurements for fluorescence thermometry. Review of Scientific Instruments, 2000, 71, 2938-2943. | 0.6 | 28 |
| 60 | Field tests of fibre Bragg grating sensors incorporated into CFRP for railway bridge strengthening condition monitoring. Sensors and Actuators A: Physical, 2008, 148, 68-74. | 2.0 | 28 |
| 61 | Fiber optic sensor designs and luminescence-based methods for the detection of oxygen and pH measurement. Measurement: Journal of the International Measurement Confederation, 2021, 178, 109323. | 2.5 | 28 |
| 62 | Strain Measurement Using Embedded Fiber Bragg Grating Sensors Inside an Anchored Carbon Fiber Polymer Reinforcement Prestressing Rod for Structural Monitoring. IEEE Sensors Journal, 2009, 9, 1456-1461. | 2.4 | 27 |
| 63 | A high-Qlow threshold thulium-doped silica microsphere laser in the 2 Î¼m wavelength region designed for gas sensing applications. Laser Physics Letters, 2013, 10, 085101. | 0.6 | 27 |
| 64 | Underwater Free-Vibration Analysis of Full-Scale Marine Propeller Using a Fiber Bragg Grating-Based Sensor System. IEEE Sensors Journal, 2016, 16, 946-953. | 2.4 | 27 |
| 65 | Simultaneous measurement of temperature and strain with long period grating pairs using low resolution detection. Sensors and Actuators A: Physical, 2008, 144, 83-89. | 2.0 | 26 |
| 66 | Characteristics of Er and Erâ€“Ybâ€“Cr doped phosphate microsphere fibre lasers. Optics Communications, 2009, 282, 3765-3769. | 1.0 | 26 |
| 67 | Fibre Bragg Grating-Based Cascaded Acoustic Sensors for Potential Marine Structural Condition Monitoring. Journal of Lightwave Technology, 2016, 34, 4473-4478. | 2.7 | 26 |
| 68 | Design and Modeling of a High Sensitivity Fiber Bragg Grating-Based Accelerometer. IEEE Sensors Journal, 2019, 19, 5439-5445. | 2.4 | 26 |
| 69 | Highly photosensitive Sb/Er/Ge-codoped silica fiber for writing fiber Bragg gratings with strong high-temperature sustainability. Optics Letters, 2003, 28, 2025. | 1.7 | 25 |
| 70 | Thermal decay characteristics of strong fiber Bragg gratings showing high-temperature sustainability. Journal of the Optical Society of America B: Optical Physics, 2007, 24, 430. | 0.9 | 25 |
| 71 | Compact Tm-doped fibre laser pumped by a 1600nm Er-doped fibre laser designed for environmental gas sensing. Sensors and Actuators A: Physical, 2015, 226, 11-20. | 2.0 | 25 |
| 72 | Laser Cladding-Based Metallic Embedding Technique for Fiber Optic Sensors. Journal of Lightwave Technology, 2018, 36, 1018-1025. | 2.7 | 25 |

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| 73 | TDLAS Detection of Propane/Butane Gas Mixture by Using Reference Gas Absorption Cells and Partial Least Square Approach. IEEE Sensors Journal, 2018, 18, 8587-8596. | 2.4 | 25 |
| 74 | Comprehensive Monitoring of Electrical Machine Parameters Using an Integrated Fiber Bragg Grating-Based Sensor System. Journal of Lightwave Technology, 2018, 36, 1046-1051. | 2.7 | 24 |
| 75 | Bragg grating tuned fiber laser system for measurement of wider range temperature and strain. Optics Communications, 2005, 244, 111-121. | 1.0 | 23 |
| 76 | Temporal thermal response of Type II-IR fiber Bragg gratings. Applied Optics, 2009, 48, 3001. | 2.1 | 23 |
| 77 | A Turn-On Fluorescence-Based Fibre Optic Sensor for the Detection of Mercury. Sensors, 2019, 19, 2142. | 2.1 | 23 |
| 78 | Determination of the Aspect-ratio Distribution of Gold Nanorods in a Colloidal Solution using UV-visible absorption spectroscopy. Scientific Reports, 2019, 9, 17469. | 1.6 | 23 |
| 79 | Simultaneous strainâ€“temperature measurement using fluorescence from Yb-doped silica fiber. Review of Scientific Instruments, 2000, 71, 2267-2269. | 0.6 | 22 |
| 80 | Fluorescence decay characteristic of Tm-doped YAG crystal fiber for sensor applications, investigated from room temperature to 1400 Â°C. IEEE Sensors Journal, 2003, 3, 507-512. | 2.4 | 22 |
| 81 | Wireless Sensor Network Platform for Intrinsic Optical Fiber pH Sensors. IEEE Sensors Journal, 2014, 14, 1313-1320. | 2.4 | 22 |
| 82 | Strain-independent temperature measurement using a type-I and type-IIA optical fiber Bragg grating combination. Review of Scientific Instruments, 2004, 75, 1327-1331. | 0.6 | 21 |
| 83 | High-temperature sustainability of strong fiber Bragg gratings written into Sbâ€“Ge-codoped photosensitive fiber: decay mechanisms involved during annealing. Optics Letters, 2004, 29, 554. | 1.7 | 21 |
| 84 | Development of low cost packaged fibre optic sensors for use in reinforced concrete structures. Measurement: Journal of the International Measurement Confederation, 2019, 135, 617-624. | 2.5 | 21 |
| 85 | Chloride ion optical sensing using a long period grating pair. Sensors and Actuators A: Physical, 2008, 141, 390-395. | 2.0 | 20 |
| 86 | Development and Longer Term In Situ Evaluation of Fiber-Optic Sensors for Monitoring of Structural Concrete. IEEE Sensors Journal, 2009, 9, 1537-1545. | 2.4 | 20 |
| 87 | Stray light correction for diode-array-based spectrometers using a monochromator. Applied Optics, 2011, 50, 5130. | 2.1 | 20 |
| 88 | Design Evaluation of a High Birefringence Single Mode Optical Fiber-Based Sensor for Lateral Pressure Monitoring Applications. IEEE Sensors Journal, 2013, 13, 4459-4464. | 2.4 | 20 |
| 89 | Quasi-Distributed Fiber Optic Temperature and Humidity Sensor System for Monitoring of Grain Storage in Granaries. IEEE Sensors Journal, 2020, 20, 9226-9233. | 2.4 | 20 |
| 90 | Novel coumarin-based pH sensitive fluorescent probes for the highly alkaline pH region. Dyes and Pigments, 2020, 177, 108312. | 2.0 | 20 |

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| 91 | LPG-based optical fibre sensor for acoustic wave detection. Sensors and Actuators A: Physical, 2012, 173, 97-101. | 2.0 | 19 |
| 92 | Analysis of double exponential fluorescence decay behavior for optical temperature sensing. Review of Scientific Instruments, 1997, 68, 58-63. | 0.6 | 18 |
| 93 | Simultaneous measurement of strain (to 2000 /spl mu//spl epsiv/) and temperature (to 600/spl deg/C) using a combined Sb-Er-Ge-codoped fiber-fluorescence and grating-based technique. IEEE Sensors Journal, 2005, 5, 1462-1468. | 2.4 | 18 |
| 94 | Intrinsic strain and temperature characteristics of Yb-doped silica-based optical fibers. Review of Scientific Instruments, 1999, 70, 1447-1451. | 0.6 | 17 |
| 95 | Fibre optic chemical sensor systems for internal concrete condition monitoring. , 2004, 5502, 334. | | 17 |
| 96 | In Situ Cross-Calibration of In-Fiber Bragg Grating and Electrical Resistance Strain Gauges for Structural Monitoring Using an Extensometer. IEEE Sensors Journal, 2009, 9, 1355-1360. | 2.4 | 17 |
| 97 | Novel Sensor Design Using Photonic Crystal Fibres for Monitoring the Onset of Corrosion in Reinforced Concrete Structures. Journal of Lightwave Technology, 2014, 32, 891-896. | 2.7 | 17 |
| 98 | Dual temperature and strain measurement with the combined fluorescence lifetime and Bragg wavelength shift approach in doped optical fiber. Applied Optics, 2002, 41, 6585. | 2.1 | 16 |
| 99 | Preliminary Development and Evaluation of Fiber-Optic Chemical Sensors. Journal of Materials in Civil Engineering, 2011, 23, 1200-1210. | 1.3 | 16 |
| 100 | Tunable Diode Laser Absorption Spectroscopy- Based Detection of Propane for Explosion Early Warning by Using a Vertical Cavity Surface Enhanced Laser Source and Principle Component Analysis Approach. IEEE Sensors Journal, 2017, 17, 4975-4982. | 2.4 | 16 |
| 101 | Fiber optic chemical sensor systems for monitoring pH changes in concrete. , 2004, , . | | 15 |
| 102 | Fiber Optic pH Sensor Using Optimized Layer-by-Layer Coating Approach. IEEE Sensors Journal, 2014, 14, 47-54. | 2.4 | 15 |
| 103 | Underwater Pressure and Temperature Sensor Based on a Special Dual-Mode Optical Fiber. IEEE Access, 2020, 8, 146463-146471. | 2.6 | 15 |
| 104 | A Fiber Bragg Grating (FBG)-Based Sensor System for Anaerobic Biodigester Humidity Monitoring. IEEE Sensors Journal, 2021, 21, 1540-1547. | 2.4 | 15 |
| 105 | Analysis of the double exponential behavior in alexandrite for optical temperature sensing applications. Review of Scientific Instruments, 1997, 68, 3442-3446. | 0.6 | 14 |
| 106 | Characterization of an optical fiber thermometer using Tm3+:YAG crystal, based on the fluorescence lifetime approach. Sensors and Actuators A: Physical, 2003, 109, 53-59. | 2.0 | 14 |
| 107 | Bragg grating performance in Erâ€“Sn-doped germanosilicate fiber for simultaneous measurement of wide range temperature (to 500â€ŠÂ°C) and strain. Review of Scientific Instruments, 2003, 74, 4858-4862. | 0.6 | 14 |
| 108 | Enhanced FBG sensor-based system performance assessment for monitoring strain along a prestressed CFRP rod in structural monitoring. Sensors and Actuators A: Physical, 2009, 151, 127-132. | 2.0 | 14 |

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| 109 | Energy-transfer parameters in a Tm/Yb doped single mode silica fiber. Journal of the Optical Society of America B: Optical Physics, 2010, 27, 2714. | 0.9 | 14 |
| 110 | The Microbial Habitability of Weathered Volcanic Glass Inferred from Continuous Sensing Techniques. Astrobiology, 2011, 11, 651-664. | 1.5 | 14 |
| 111 | Fiber Optic Strain Monitoring for Long-Term Evaluation of a Concrete Footbridge Under Extended Test Conditionss. IEEE Sensors Journal, 2013, 13, 1036-1043. | 2.4 | 14 |
| 112 | Analysis of Fiber Optic Sensor Embedded in Metals by Automatic and Manual TIG Welding. IEEE Sensors Journal, 2019, 19, 7425-7433. | 2.4 | 14 |
| 113 | Quasidistributed fluorescence-based optical fiber temperature sensor system. Review of Scientific Instruments, 1998, 69, 146-151. | 0.6 | 13 |
| 114 | Directional Force Measurement Using Specialized Single-Mode Polarization-Maintaining Fibers. Journal of Lightwave Technology, 2011, 29, 3611-3615. | 2.7 | 13 |
| 115 | Long Period Grating-based optical fibre sensor for the underwater detection of acoustic waves. Sensors and Actuators A: Physical, 2013, 201, 289-293. | 2.0 | 13 |
| 116 | Fiber Bragg Grating-Based System for 2-D Analysis of Vibrational Modes of a Steel Propeller Blade. Journal of Lightwave Technology, 2014, 32, 4593-4599. | 2.7 | 13 |
| 117 | A Novel Wireless Mobile Platform to Locate and Gather Data From Optical Fiber SensorsIntegrated Into a WSN. IEEE Sensors Journal, 2015, 15, 3615-3621. | 2.4 | 13 |
| 118 | Computational Design and Fabrication of Optical Fibre Fluorescent Chemical Probes for the Detection of Cocaine. Journal of Lightwave Technology, 2015, 33, 2572-2579. | 2.7 | 13 |
| 119 | Sensitivity enhancement of long period gratings for temperature measurement using the long period grating pair technique. Sensors and Actuators A: Physical, 2008, 141, 314-320. | 2.0 | 12 |
| 120 | Optical fibre sensors for the measurement of concrete sample properties following exposure to freeze/thaw tests. Sensors and Actuators A: Physical, 2009, 153, 166-170. | 2.0 | 12 |
| 121 | Fibre Grating-based Sensor Design for Humidity Measurement in Chemically Harsh Environment. Procedia Engineering, 2016, 168, 1317-1320. | 1.2 | 12 |
| 122 | Sensors for Harsh Environment: Radiation Resistant FBG Sensor System. Journal of Lightwave Technology, 2017, 35, 3393-3398. | 2.7 | 12 |
| 123 | High-Sensitivity â€œHot-Wireâ€•Based Gas Velocity Sensor for Safe Monitoring in Mining Applications. IEEE Sensors Journal, 2018, 18, 10192-10198. | 2.4 | 12 |
| 124 | Encapsulation of Fiber Optic Sensors in 3D Printed Packages for Use in Civil Engineering Applications: A Preliminary Study. Sensors, 2019, 19, 1689. | 2.1 | 12 |
| 125 | Ultrasensitive Refractive Index Sensor Based on Machâ€“Zehnder Interferometer and a 40Î¼m Fiber. Journal of Lightwave Technology, 2021, 39, 5625-5633. | 2.7 | 12 |
| 126 | Erbium-doped intrinsic fiber sensor for cryogenic temperature measurement. Sensors and Actuators A: Physical, 1998, 71, 183-186. | 2.0 | 11 |

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| 127 | Studies on Temperature and Strain Sensitivities of a Few-Mode Critical Wavelength Fiber Optic Sensor. IEEE Sensors Journal, 2019, 19, 1794-1801. | 2.4 | 11 |
| 128 | Analysis of dopant concentration effects in praseodymium-based fluorescent fiber optic temperature sensors. Review of Scientific Instruments, 2000, 71, 100-103. | 0.6 | 10 |
| 129 | Investigation of the photosensitivity, temperature sustainability and fluorescence characteristics of several Er-doped photosensitive fibers. Optics Communications, 2004, 237, 301-308. | 1.0 | 10 |
| 130 | Measurement of decay time based on FFT. Optics and Laser Technology, 2004, 36, 323-326. | 2.2 | 10 |
| 131 | Stability performance of short cavity Er-doped fiber lasers. Optics Communications, 2010, 283, 1067-1070. | 1.0 | 10 |
| 132 | Temperature characterization of Long Period Gratings written in three different types of optical fibre for potential high temperature measurements. Sensors and Actuators A: Physical, 2010, 160, 29-34. | 2.0 | 10 |
| 133 | Lateral force sensing system based on different photonic crystal fibres. Sensors and Actuators A: Physical, 2014, 205, 86-91. | 2.0 | 10 |
| 134 | Fibre Bragg Grating-Based Acoustic Sensor Array for Improved Condition Monitoring of Marine Lifting Surfaces. Journal of Lightwave Technology, 2016, 34, 4336-4342. | 2.7 | 10 |
| 135 | In-Sewer Field-Evaluation of an Optical Fibre-Based Condition Monitoring System. IEEE Sensors Journal, 2020, 20, 2976-2981. | 2.4 | 10 |
| 136 | Intrinsic doped fluorescence decay-time based measurementsâ€"strain and temperature characteristics for sensor purposes. Review of Scientific Instruments, 1998, 69, 4186-4190. | 0.6 | 9 |
| 137 | Characteristics of doped optical fiber for fluorescence-based fiber optic temperature systems. Review of Scientific Instruments, 2003, 74, 5212-5218. | 0.6 | 9 |
| 138 | Photosensitive Indium-Doped Germanoâ€"Silica Fiber for Strong FBGs With High Temperature Sustainability. IEEE Photonics Technology Letters, 2004, 16, 1319-1321. | 1.3 | 9 |
| 139 | High sensitivity long-period grating-based temperature monitoring using a wide wavelength range to 2.2Î¼m. Optics Communications, 2006, 268, 42-45. | 1.0 | 9 |
| 140 | Analysis of the Characteristics of PVA-Coated LPG-Based Sensors to Coating Thickness and Changes in the External Refractive Index. IEEE Sensors Journal, 2013, 13, 1117-1124. | 2.4 | 9 |
| 141 | Structural parameter study of dual transducers-type ultrasonic levitation-based transportation system. Smart Materials and Structures, 2021, 30, 045009. | 1.8 | 9 |
| 142 | Extended Study of Fiber Optic-Based Humidity Sensing System Performance for Sewer Network Condition Monitoring. IEEE Sensors Journal, 2021, 21, 7665-7671. | 2.4 | 9 |
| 143 | Characterization of a fast response fiber-optic pH sensor and illustration in a biological application. Analyst, The, 2021, 146, 4811-4821. | 1.7 | 9 |
| 144 | A wide temperature tunable fibre laser using a chirped grating and a type IIA fibre Bragg grating. Measurement Science and Technology, 2004, 15, 1113-1119. | 1.4 | 8 |

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| 145 | Bragg gratings written in Snâ€“Erâ€“Ge-codoped silica fiber: investigation of photosensitivity, thermal stability, and sensing potential. Journal of the Optical Society of America A: Optics and Image Science, and Vision, 2004, 21, 1503. | 0.8 | 8 |
| 146 | Furnace uniformity effects on Reâ€“C fixed-point melting plateaux. Metrologia, 2009, 46, 33-42. | 0.6 | 8 |
| 147 | Development of multi-wavelength microsphere fibre laser system for potential sensor applications. Optics Communications, 2009, 282, 401-405. | 1.0 | 8 |
| 148 | Optical sensor for pH monitoring using a layer-by-layer deposition technique emphasizing enhanced stability and re-usability. Sensors and Actuators B: Chemical, 2014, 195, 692-701. | 4.0 | 8 |
| 149 | A Sensitive and Reliable Carbon Monoxide Monitor for Safety-Focused Applications in Coal Mine Using a 2.33-$mu$ m Laser Diode. IEEE Sensors Journal, 2020, 20, 171-177. | 2.4 | 8 |
| 150 | Optical fibre thermometry using ratiometric green emission of an upconverting nanoparticle-polydimethylsiloxane composite. Sensors and Actuators A: Physical, 2020, 312, 112083. | 2.0 | 8 |
| 151 | Determination of local high temperature excursion in an intrinsic doped fiber fluorescence-based sensor. Review of Scientific Instruments, 1998, 69, 2930-2934. | 0.6 | 7 |
| 152 | Frequency-domain fluorescence based fiber optic fire alarm system. Review of Scientific Instruments, 2001, 72, 2191-2196. | 0.6 | 7 |
| 153 | A Parallel Multiplexed Temperature Sensor System Using Bragg-Grating-Based Fiber Lasers. IEEE Sensors Journal, 2006, 6, 986-995. | 2.4 | 7 |
| 154 | Tm:Ho co-doped single mode optical fibre laser pumped by a 1600nm Er fibre laser. Optics Communications, 2008, 281, 2567-2571. | 1.0 | 7 |
| 155 | Theoretical Analysis of a Non-Symmetric Polarization-Maintaining Single-Mode Fiber for Sensor Applications. Journal of Lightwave Technology, 2012, 30, 362-367. | 2.7 | 7 |
| 156 | Simultaneous Measurement of Strain and Temperature Using a Single Emission Line. Journal of Lightwave Technology, 2015, 33, 2426-2431. | 2.7 | 7 |
| 157 | Use of Eutectic Fixed Points to Characterize a Spectrometer for Earth Observations. International Journal of Thermophysics, 2007, 28, 2041-2048. | 1.0 | 6 |
| 158 | Experimental Optimization in Terms of Power Stability and Output Power of Highly Erbium-Doped Fiber Lasers with Single and Hybrid Cavities. Fiber and Integrated Optics, 2010, 29, 106-120. | 1.7 | 6 |
| 159 | Generation of periodic surface structures on silica fibre surfaces using 405 nm CW diode lasers. Journal of Non-Crystalline Solids, 2013, 361, 106-110. | 1.5 | 6 |
| 160 | Structural monitoring for asset management of railway bridges. Proceedings of the Institution of Civil Engineers: Bridge Engineering, 2014, 167, 157-169. | 0.3 | 6 |
| 161 | Use of optical fibres for multi-parameter monitoring in electrical AC machines. , 2017, , . | | 6 |
| 162 | Monitoring of the Critical Meniscus of Very Low Liquid Volumes Using an Optical Fiber Sensor. IEEE Sensors Journal, 2020, 20, 12232-12240. | 2.4 | 6 |

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| 163 | Optical-Fiber Sensors: Temperature and Pressure Sensors. MRS Bulletin, 2002, 27, 389-395. | 1.7 | 5 |
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