DESCRIPTION

Sensors & Actuators, B: Chemical is an interdisciplinary journal dedicated to publishing research and development in the field of chemical sensors and biosensors, chemical actuators and analytical Microsystems. The journal aims to promote original works that demonstrate significant progress beyond the current state of the art in these fields along with applicability to solve meaningful analytical problems. Review articles may only be submitted upon invitation from an Editor of the journal.

The journal aims to publish works that are supported by experimental results and as such purely theoretical works are not accepted. The analytical performance in all analytical parameters needs to be reported and critically compared with the state of the art. Sensing applications will be considered only if they refer to analytically challenging complex samples and are properly validated.

The scope of the journal encompasses, but is not restricted to, the following areas:
- Novel chemical sensing and biosensing concepts, mechanisms and detection principles
- Development of chemical sensors and biosensors
- Fabrication technology of chemical sensors, biosensors, chip-based detection devices and chemical actuators
- Chemical actuators including soft actuators, micro- and nanomotors, microfluidic components
- Photonic and biophotonic sensors and chemical sensing systems
- Lab-on-a-chip, Micro Total Analysis Systems (TAS) and other biochips and microarray systems
- Sensor and sensor-array chemometrics

Reports on new materials, chemical components and fabrication technologies claimed to be relevant to chemical sensing and actuation will be considered for publication only if an immediate application in that respect is presented or it presents in a novel concept or mechanism.

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Academic and Industrial Researchers in Analytical Chemistry and Instrument Development

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Jong-Heun Lee, Korea University, Seoul, The Republic of Korea

Metal oxide gas sensors, Metal oxide nanostructures for gas sensor applications, Metal oxide humidity sensors, Electrochemical gas sensors using solid oxide electrolytes, Sensing principles and mechanisms, Carbon-based gas sensors.

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Exhaust gas sensors, Solid state gas sensor materials, Solid state gas sensor principles, Solid state gas sensor technology and Solid state gas sensor modeling; Solid state electrochemical sensors; Conductometric or impedancemetric sensors of framework-based materials (zeolites, MOF); Transducer technology, LTCC, HTCC, hot plates; Chemical sensors for harsh environments.

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Fluorescence spectroscopy, Time-resolved fluorescence; Oxygen sensors; Sensor material chemistry.

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Sensors & Actuators, B: Chemical is an interdisciplinary journal dedicated to publishing research and development in the field of chemical sensors and biosensors, chemical actuators and analytical microsystems. The journal aims to promote original works that demonstrate significant progress beyond the current state of the art in these fields along with applicability to solve meaningful analytical problems. Review articles may only be submitted upon invitation from an Editor of the journal.

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