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Optical Sensors for Biological and Biomedical Applications

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Message from the Guest Editor

Optical sensors are based on the principle of light-matter interaction. Depending on the type of sensor, they can measure different properties of light, such as intensity, wavelength, polarization, phase, or frequency. They can also generate light signals using different sources, such as lasers, LEDs, or fluorescent molecules. Optical sensors have biomedical applications for detecting biomarkers and measuring physiological parameters such as blood pressure, oxygen saturation, glucose level, or temperature. They are also used for administering light-based therapies. Optical sensors have significant advantages over other types of sensors: they are non-invasive, biocompatible, versatile, sensitive, accurate, and fast. They can also be portable, implantable, or disposable.

In this Special Issue, the entire scientific community is invited to participate with their contributions addressing topics related to the design, application, improvement, and results of optical sensors for biological and biomedical applications.



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Editor-in-Chief

Message from the Editor-in-Chief

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