

## Special Issue

# Aptamer-Based Biosensors for Antibiotic Detection

### Message from the Guest Editor

The increase of antibiotic-resistant germs is an acute challenge for consumer health protection and veterinary medicine. The inappropriate and prophylactic use of antibiotics (especially in the field of animal care) is common and associated with the contamination of the environment with antibiotics and their metabolites.

Therefore, simple, sensitive, robust, and rapid methods for the evaluation of antibiotics and their residues are needed for an on-site screening analysis. Currently, many studies confirm the application of biosensors as ideal alternatives to detect antibiotics in view of their superiority such as rapid detection, high selectivity, and in situ applications. Among different biosensors, aptamer-based biosensors (aptasensors) with different detection techniques are promising tools for a multitude of applications, especially for antibiotic detection. This Special Issue aims to highlight unique research and development efforts, identifying aptasensors for the detection of various antibiotics. Research papers, short communications, and reviews are all welcome.

Keywords: aptamers; biosensors; aptasensors; antibiotics; electrochemical; mass sensitive; optical

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### Guest Editor

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### Deadline for manuscript submissions

closed (31 August 2020)



## Antibiotics

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## About the Journal

### Message from the Editor-in-Chief

There are very few fields that attract as much attention as scientific endeavor related to antibiotic discovery, use and preservation. The public, patients, scientists, clinicians, policy-makers, NGOs, governments, and supra-governmental organizations are all focusing intensively on it: all are concerned that we use our existing agents more effectively, and develop and evaluate new interventions in time to face emerging challenges for the benefit of present and future generations. We need every discipline to contribute and collaborate: molecular, microbiological, clinical, epidemiological, geographic, economic, social scientific and policy disciplines are all key. *Antibiotics* is a nimble, inclusive and rigorous indexed journal as an enabling platform for all who can contribute to solving the greatest broad concerns of the modern world.

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### Editor-in-Chief

Prof. Dr. Nicholas Dixon  
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