# **Special Issue**

# Genomic Islands

## Message from the Guest Editors

Genomic islands (GIs) have been recognized as critical players of rapid evolution in prokaryotes. Gls have been implicated in the distribution of (multiple) antibiotic resistance markers, of xenometabolic pathways, as well as of other adaptive genes for bacterial colonization of new niches. Experimental characterization and metagenomic comparisons have delineated very different GI families. Some of those share common mechanistic characteristics, e.g., integrative and conjugative elements, prophages, or mobilizable genomic islands: some other GIs lack any clear known horizontal transfer mechanisms. We now know that a high diversity exists across members of the different GI families and subfamilies in term of size, architecture, cargo genes, maintenance, dynamics, dissemination mechanism, regulation, and stability.

This Special Issue of Genes on "Genomic Islands" will address the diversity of GIs, their transfer mechanisms, as well as molecular details of GI maintenance and evolution. Submissions may include original experimental research papers, comparative genomics analyses, or review articles.

### **Guest Editors**

Prof. Dr. Jan Roelof van der Meer

Department of Fundamental Microbiology, University of Lausanne, CH-1015 Lausanne, Switzerland

Dr. Nicolas Carraro

Department of Fundamental Microbiology, University of Lausanne, CH-1015 Lausanne, Switzerland

#### Deadline for manuscript submissions

closed (1 July 2020)

G C A T T A C G G C A T

# Genes

an Open Access Journal by MDPI

Impact Factor 2.8
CiteScore 5.5
Indexed in PubMed



mdpi.com/si/28729

Genes
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
genes@mdpi.com

mdpi.com/journal/genes



# G C A T T A C G G C A T

# Genes

an Open Access Journal by MDPI

Impact Factor 2.8 CiteScore 5.5 Indexed in PubMed



# **About the Journal**

## Message from the Editor-in-Chief

Genes is central to our understanding of biology, and modern advances such as genomics and genome editing have maintained genetics as a vibrant, diverse and fast-moving field. There is a need for good quality, open access journals in this area, and the Genes team aims to provide expert manuscript handling, serious peer review, and rapid publication across the whole discipline of genetics. Starting in 2010, the journal is now well established and recognised. Why not consider Genes for your next genetics paper?

#### Editor-in-Chief

### Prof. Dr. Selvarangan Ponnazhagan

Department of Pathology, The University of Alabama at Birmingham, 1825 University Blvd, SHEL 814, Birmingham, AL 35294-2182, USA

#### **Author Benefits**

## Open Access:

free for readers, with article processing charges (APC) paid by authors or their institutions.

### **High Visibility:**

indexed within Scopus, SCIE (Web of Science), PubMed, MEDLINE, PMC, Embase, PubAg, and other databases.

#### **Journal Rank:**

JCR - Q2 (Genetics and Heredity) / CiteScore - Q2 (Genetics (clinical))

