

## Special Issue

# Localized Corrosion and Biodegradation of Metallic Biomaterials: Mechanisms, Analyses, and Characterizations

### Message from the Guest Editor

The high resistance of metallic biomaterials to corrosion, biodegradation or metal ions release is one of the most important factors to be considered in selecting metals or alloys for medical applications. Indeed, corrosion and biodegradation processes of metallic biomaterials have a direct impact on the subsequent events on their surfaces such as biocompatibility and cell adhesion. The recent innovation in metallic biomaterials results from the development of novel approaches to precisely control their surfaces to achieve the desired properties. Surface analytical techniques are required to characterize all metallic biomaterial surfaces and quantify their real chemical stability and biological systems' performance, particularly at micro- and nano- scales. Therefore, local characterization techniques can determine numerous unknown data regarding the chemical and/or electrochemical interactions/reactions, or the physical and chemical properties of simple or complex surfaces from micro-to-atomic scales. This Special Issue intends to publish articles regarding localized corrosion and biodegradation events on the surface of metallic biomaterials [...]

### Guest Editor

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### Deadline for manuscript submissions

closed (10 August 2023)



## Materials

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### Message from the Editor-in-Chief

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