



## Polysaccharide-Based Materials: Developments and Properties

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### Message from the Guest Editor

The utilisation of bio-based materials has emerged as an innovative alternative to those derived from non-renewable and non-biodegradable resources. In this context, the study and development of new materials are strongly centred on polysaccharides. The sources of polysaccharides are principally those from biomass, such as agricultural derivatives, as well as microorganisms and their metabolic processes capable of producing exopolysaccharides. The significant challenge ahead is to obtain polysaccharide-based materials with functional capacities comparable to those derived from synthetic polymers.

This Special Issue will cover original research and reviews related to polysaccharides and the physicochemical or biotechnological processes aimed at converting these biopolymers into materials like gels, hydrogels, and films for specialised applications, such as adhesives, adsorbents, carriers for bioactive compounds, and coatings. Additionally, it will encompass the study of their properties as well as their applications in packaging, technology, medicine, and other fields.





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