Special Issue

Biomarkers in Musculoskeletal and Orthopedic Disorders

Message from the Guest Editor

Musculoskeletal disorders comprise diverse conditions affecting the bones, joints, muscles, and connective tissues, such as sprains, back injuries, tendonitis, carpal tunnel syndrome, and arthritis. The most common orthopedic disorders, such as osteoarthritis, rheumatoid arthritis, osteoporosis, scoliosis, and back and spinal pain, often occur as a result of injury, trauma, disease, or age. Biomarkers of the musculoskeletal system include a wide variety of molecules indicating normal biological processes, such as bone resorption or bone formation, disease, or response to treatment, and can comprise extracellular matrix metabolites, inflammation markers, muscle-specific markers, hormones, or proteins. Since, in some cases, we still lack completely reliable biomarkers for diagnosis, the identification of risk factors, and the prediction of responses to treatment, there is increasing research on the identification and application of new markers. Going forward, our evolving knowledge base and the application of artificial intelligence to develop advanced methods will play a crucial role in this field.

Guest Editor

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Biomolecules is a multidisciplinary open-access journal that reports on all aspects of research related to biogenic substances, from small molecules to complex polymers. We invite manuscripts of high scientific quality that pertain to the diverse aspects relevant to organic molecules, irrespective of the biological question or methodology. We aim for a competent, fair peer review and rapid publication. Please look at some of the exciting work that has been published in Biomolecules so far. We would be delighted to welcome you as one of our authors.

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