Special Issue

Tissue-Specific Direct and Indirect Effects of Metformin and Its Application

Message from the Guest Editor

The pharmacological effect and clinical applications of Metformin, a drug with a long history of use, differ depending on the target tissue, in spite of regulating the same signal pathway. In this review paper, the mechanism of actions of Metformin are divided into direct effects on target tissues and indirect effects via non-targeted tissues. Beginning with the mechanism by which Metformin is distributed to the target tissue. diverse actions of Metformin in tissue-specific applications and its representative cases are introduced. In particular, DNA, RNA, protein, as well as microRNA regulation by Metformin in specific tissues are covered. In addition, indirect effects of Metformin on non-targeting tissue as well as how Metformin is applied to disease control in this indirect pathway are mentioned.

Guest Editor

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