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New Insights in the Synthesis and Applications of Hydroxyapatite and Composites

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Message from the Guest Editor

The main interest of many research centers is the preparation of new, modern, and technologically advanced materials that are both cheap, easily available, and effective in operation and at the same time minimize process times. This Special Edition, is devoted to the characterization of new types of hydroxyapatite and its composites syntheses and modifications, mainly intended to solve environmental and medical problems. Hydroxyapatite can be obtained by a variety of methods. In general, the following groups can be distinguished: wet methods, dry methods, high temperature methods, and combined methods. Among these techniques, more specific approaches can be highlighted. In recent research, the most common methods are wet methods, including chemical precipitation. The hydrothermal method is also frequently used. Moreover, some scientists utilize the sol-gel method. Some experiments employ techniques using microwaves, ultrasounds or pyrolysis. In turn, the biomimetic method is favored in biological studies. Each synthetic route affects the structure, crystallinity, form, and proportion of the resulting composites.



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Special Issue



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Message from the Editor-in-Chief

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