
Preface

Until recently, the infrared spectroscopy had no broad application as a method of identification of minerals. The main reason for this was the lack of sufficiently complete reference books and databases in this area. To fill this gap, a handbook (Chukanov 2014) containing more than three thousands spectra of about two thousands minerals obtained by the author was published by Springer. However, these data were still incomplete, and it was the main reason for the publication of this book, which is the most complete compilation, with a critical review, of the most reliable data on more than 1300 IR spectra of minerals and related compounds published during last sixty years. In addition, this book contains about three hundreds IR spectra of minerals which were obtained by the authors and have never been published earlier. Along with the spectra, the book contains various supporting data on the localities, general appearance, mineral associations, crystallographic characteristics, chemical composition, and some properties of reference samples, as well as kind of sample preparation and methods of spectra registration.

In Chap. 1, the most important methodological aspects and some modern trends in the IR spectroscopy of minerals are overviewed. Chapter 2 contains IR spectra of minerals accompanied by authors' comments and characteristics of reference samples.

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