



Iron Ore Flotation

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Message from the Guest Editors

Dear Colleagues,

Iron ore flotation is a key technique to concentrate intermediate-low-grade ore, in order to reach the market requirements for higher-grade concentrates of iron. The presence of some impurities in addition to quartz in iron ore, aluminium silicates, and minerals containing phosphorus impair productivity in the steel industry and have an impact on iron ore concentrate value. The flotation method most commonly applied is the one that is based on cationic flotation of silica and silicates (reverse flotation), and which is preceded by desliming. As the complexity of mineralogy grows, in terms of extremely fine mineral liberation and very complex intergrowths, a number of significant issues come into view. Thus, there is a crucial need for research designed to make the iron ore mining industry more sustainable. This Special Issue will focus on recent advances in iron ore flotation, including but not limited to topics such as fundamental reagent, flotation chemistry, bubbles, froths, bubble–particle interactions, flotation applications, and plant practice.





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Message from the Editor-in-Chief

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