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Titolo	Mine wastes and water, ecological engineering and metals extraction : sustainability and circular economy / / edited by Margarete Kalin-Seidenfaden and William N. Wheeler
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Sommario/riassunto	"The book reviews past and present mine waste management processes. It estimates global water consumption by major mining resources per annum. This consumption will lead land use resources (agriculture and water) to collide with mining interests expected in the near future. With the application of novel metal extraction processes and the adoption of ecological engineering as an approach to waste and water management, a reduction in water and land consumption can be achieved. Using these methodologies would make mining more sustainable. Together with ore and metal recycling, mining methods can be brought into the 21st century. The book describes natural weathering processes and the microbiology of extreme environments, also known as mine sites. The role of microbes in weathering and remediation is emphasized, along with case studies of the enhancement of various ecological processes which curtail weathering and transform pollutants, creating ore bodies of the future. This book has been written as an extension to a contribution to the Oxford Research Encyclopedia. It adds depth and many examples from 40 years of multidisciplinary work with experts from geology, hydrogeology, geomicrobiology and algal physiology and chemistry,

items too extensive for the Encyclopedia."

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