1. Record Nr. UNINA9910299434903321 Engineering Geology for Society and Territory - Volume 1 : Climate Titolo Change and Engineering Geology / / edited by Giorgio Lollino, Andrea Manconi, John Clague, Wei Shan, Marta Chiarle Cham:,: Springer International Publishing:,: Imprint: Springer,, Pubbl/distr/stampa 2015 **ISBN** 3-319-09300-2 Edizione [1st ed. 2015.] 1 online resource (532 p.) Descrizione fisica Disciplina 363.728 Soggetti Geotechnical engineering Climate change Engineering geology Engineering—Geology Foundations Hydraulics Historical geology Geotechnical Engineering & Applied Earth Sciences Climate Change/Climate Change Impacts Geoengineering, Foundations, Hydraulics **Historical Geology** Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Description based upon print version of record. Nota di bibliografia Includes bibliographical references and index. Nota di contenuto Part I Climate Change and the Mountain Environment -- Part II Climate Change and Water Resources -- Part III Climate Change: Impacts on Natural Resources and Hazards -- Part IV Downscaling Climate Information for Impact Studies -- Part V Environmental and Engineering Geological Problems in Permafrost Regions in the Context of a Warming

Natural Resources and Hazards -- Part IV Downscaling Climate
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Slope Dynamics and its Control in a Climate Change Scenario.

Sommario/riassunto

This book is one out of 8 IAEG XII Congress volumes, and deals with climate change affecting different natural processes and environments. such as slope dynamics, water courses, coastal and marine environments, hydrological and littoral processes, and permafrost terrain. Due to climate change, major effects are also expected on territorial planning and infrastructure, particularly in extreme climate regions. The volume and its contents aim to analyze the role of engineering geology and the solutions it may offer with respect to the ongoing environmental changes. Contributions regard the modeling of both the factors and the effects induced by climate change. Potential impacts of the climate change on the common practice and routine work of engineering geologists are also analyzed, with particular attention to the risk assessment and mitigation procedures and to the adaptation measures adopted. The Engineering Geology for Society and Territory volumes of the IAEG XII Congress held in Torino from September 15-19, 2014, analyze the dynamic role of engineering geology in our changing world and build on the four main themes of the congress: environment, processes, issues, and approaches. The congress topics and subject areas of the 8 IAEG XII Congress volumes are: Climate Change and Engineering Geology Landslide Processes River Basins, Reservoir Sedimentation and Water Resources Marine and Coastal Processes Urban Geology, Sustainable Planning and Landscape Exploitation Applied Geology for Major Engineering Projects Education, Professional Ethics and Public Recognition of Engineering Geology Preservation of Cultural Heritage.