1. Record Nr. UNINA9911021151703321 Autore Bhawani Showkat Ahmad Titolo Biobased Materials and Their Composites for Oil Spill Treatment // edited by Showkat Ahmad Bhawani, Aamir Hussain Bhat, Mohamad Nasir Mohamad Ibrahim Singapore:,: Springer Nature Singapore:,: Imprint: Springer,, 2025 Pubbl/distr/stampa **ISBN** 981-9660-49-1 Edizione [1st ed. 2025.] Descrizione fisica 1 online resource (268 pages) Collana Composites Science and Technology, , 2662-1827 Altri autori (Persone) BhatAamir Hussain Mohamad IbrahimMohamad Nasir Disciplina 620.192 Soggetti **Biopolymers Biomaterials** Green chemistry **Pollution Green Chemistry** Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di contenuto 1. Introduction to oil spill treatment -- 2. An Overview of Mechanized Solutions for Oil Spill Treatment -- 3. Impacts of Oil Spill on Geotechnical Properties of Soil -- 4. Biobased nanomaterials A green remedy for oil spill treatment -- 5. Biodegradable Waste Sorbents for Oil Spill Treatment -- 6. Biomass sorbents for oil spill treatment -- 7. Carbon based materials for Oil spill treatment. Sommario/riassunto This book provides solid, quantitative descriptions and reliable guidelines, reflecting the maturation and demand of the field and the development of bio-based methods for the treatment of oil spill. This book focuses on the different materials used for the oil spill treatment such as chitosan, carbon, lignin, carbohydrates and other bio-based materials (nanoparticles, membranes, aerogels, etc.). The coverage of book will highlight the most exciting applications in the field of oil spill treatment. This book is of interest to researchers working in the fields of material science of oil spill treatment, environmental chemistry, separation science, green and sustainable extraction techniques and bio-wastes.