

1. Record Nr.	UNINA9910674048703321
Autore	Appetecchi Giovanni Battista
Titolo	Composite Electrolyte & Electrode Membranes for Electrochemical Energy Storage & Conversion Devices
Pubbl/distr/stampa	Basel, Switzerland, : MDPI - Multidisciplinary Digital Publishing Institute, 2021
Descrizione fisica	1 online resource (164 p.)
Soggetti	Research & information: general Technology: general issues
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Sommario/riassunto	<p>Electrochemical energy systems can successfully exploit beneficial characteristics of electrolyte and/or electrode membranes due to their intriguing peculiarities that make them well-established, standard components in devices such as fuel cells, electrolyzers, and flow batteries. Therefore, more and more researchers are attracted by these challenging yet important issues regarding the performance and behavior of the final device. This Special Issue of Membranes offers scientists and readers involved in these topics an appealing forum to bring and summarize the forthcoming Research & Development results, which stipulates that the composite electrolyte/electrode membranes should be tailored for lithium batteries and fuel cells. Various key aspects, such as synthesis/preparation of materials/components, investigation of the physicochemical and electrochemical properties, understanding of phenomena within the materials and electrolyte/electrode interface, and device manufacturing and performance, were presented and discussed using key research teams from internationally recognized experts in these fields.</p>