

1. Record Nr.	UNINA9910963275503321
Titolo	Designing dendrimers // edited by Sebastiano Campagna, Paola Ceroni, Fausto Puntoriero
Pubbl/distr/stampa	Hoboken, NJ, : Wiley, 2012
ISBN	9786613282767 9781118111062 1118111060 9781283282765 1283282763 9781118111055 1118111052
Edizione	[1st ed.]
Descrizione fisica	1 online resource (622 p.)
Classificazione	SCI050000
Altri autori (Persone)	CampagnaSebastiano CeroniPaola PuntorieroFausto <1974->
Disciplina	620.1/92
Soggetti	Dendrimers Polymers
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	Designing Dendrimers; CONTENTS; Preface; List of Contributors; 1 Dendrimers as quantized nano-modules in the nanotechnology field; 2 Novel methods for dendrimer synthesis; 3 Designer monomers to tailored dendrimers; 4 Dendronized polymers: state of the art in Zurich; 5 Shape persistent polyphenylene-based dendrimers; 6 Dendrimer chemistry with fullerenes; 7 Redox and fluorescent open core dendrimers; 8 Redox-active organometallic dendrimers as electrochemical sensors; 9 Shape-persistent conjugated dendrimers for organic electronics; 10 Fine-controlled metal assembly in dendrimers 11 Enlightening structure and properties of dendrimers by fluorescence depolarization12 Single-molecule spectroscopy of dendrimer systems; 13 Degradable dendrimers; 14 Porphyrin dendrimers as biological oxygen sensors; 15 Peptide dendrimers as artificial proteins; 16 Phosphorus-containing dendritic architectures: synthesis and

Sommario/riassunto

Research on dendrimers has exploded in the last 15 years, moving from the establishment of synthetic methodologies, particularly in the early years up to the end of nineties, towards sophisticated and wide-ranging applications. Dendrimers play an important role in many different areas, spanning from basic synthetic approaches to artificial photosynthesis, to medicine, to catalysis. The great potential of dendrimers is well-recognized by the hundreds of papers in the field and the increasing number of patents, and stimulated developments in other areas of knowledge, including new characterizati
