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Lingua di pubblicazione	Inglese
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Nota di contenuto	Homoepitaxial diamond growth -- Surface chemistry of diamond -- Diamond nanostructures -- Diamond nanoparticles -- Diamond for energy applications -- Diamond composites -- Diamond electrochemical devices -- Diamond MEMS devices -- Chemical mechanical polishing of diamond -- Diamond color centers, etc -- P-doped diamond -- Large-area diamond films -- Novel aspects of diamond chemistry.
Sommario/riassunto	This book is in honor of the contribution of Professor Xin Jiang (Institute of Materials Engineering, University of Siegen, Germany) to

diamond. The objective of this book is to familiarize readers with the scientific and engineering aspects of CVD diamond films and to provide experienced researchers, scientists, and engineers in academia and industry with the latest developments and achievements in this rapidly growing field. This 2nd edition consists of 14 chapters, providing an updated, systematic review of diamond research, ranging from its growth, and properties up to applications. The growth of single-crystalline and doped diamond films is included. The physical, chemical, and engineering properties of these films and diamond nanoparticles are discussed from theoretical and experimental aspects. The applications of various diamond films and nanoparticles in the fields of chemistry, biology, medicine, physics, and engineering are presented.

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