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Nota di contenuto	Developments in Dielectric Materials and Electronic Devices; Contents; Preface; Material Design, Synthesis & Properties; Hydrothermal Synthesis and Properties of Sodium-Doped Bismuth Titanate Powders; Novel Processing of Functional Ceramic Films by CSD with UV Irradiation; Processing and Dielectric Properties of La(Zn <sub>1/2</sub> Ti <sub>1/2</sub> )O <sub>3</sub> and Nd(Zn <sub>1/2</sub> Ti <sub>1/2</sub> )O <sub>3</sub> ; Effect of Synthesis Parameters on Nanocrystalline PZT Powder; Nanocrystalline Lead Free Piezoceramic (K <sub>x</sub> Na <sub>1-x</sub> )NbO <sub>3</sub> Derived From Microemulsion Mediated Synthesis; Variable-Temperature Microwave Dielectric Properties of Single-Crystal Fluorides Temperature and Frequency Dependence of Dielectric Properties in BSTThe Optical and Electrical Properties of Nanocrystalline La <sub>0.4</sub> Sr <sub>0.6</sub> TiO <sub>3</sub> Thin Films; Relationship Between Microstructure and Electrical

Properties in Various Rare-Earth Doped BME Materials; Effects of Lead Stoichiometry on the Microstructure and Mechanical Properties of PZT 95/5; Microstructure Evolution and Ferroelectric Domains in Nb<sub>2</sub>O<sub>5</sub> and CaZrO<sub>3</sub> Doped BaTiO<sub>3</sub>; Microstructure and Microwave Dielectric Properties of (1-x)ZnNb<sub>2</sub>O<sub>6</sub>-xZnTa<sub>2</sub>O<sub>6</sub> Ceramics  
The Synergistic Effects of Nb/Mn and Sb/Mn on the Microstructure and Electrical Characteristics of BaTiO<sub>3</sub> Based Ceramics  
Thermoelectric Properties of Ca-Doped (ZnO)Mn<sub>2</sub>O<sub>3</sub> Ceramics and Their Improvement Upon Texture; Materials for Electronic Devices; BaTiO<sub>3</sub>: From Nanopowders to Dense Nanocrystalline Ceramics; Crystallization, Microstructure and Dielectric Properties of PbO-BaO-SrO-Nb<sub>2</sub>O<sub>5</sub>-B<sub>2</sub>O<sub>3</sub>-SiO<sub>2</sub> Based Glass-Ceramics; Polarization Properties and Ferroelectric Distortion of La-Substituted Bi<sub>4</sub>Ti<sub>3</sub>O<sub>12</sub> Ceramics: Comparisons with V- and Nb-Doped Ceramics  
Dielectric Ceramics from the TiO<sub>2</sub>-TeO<sub>2</sub> and Bi<sub>2</sub>O<sub>3</sub>-TeO<sub>2</sub> Systems  
Origin of High Dielectric Properties of NM-Sized Barium Titanate Crystallites; Piezoelectric Properties of Bismuth Sodium Titanate Ceramics; Nonlead Perovskite Piezoelectric Materials; MEMS Device Arrays Using Thick Composite PZT Films; Thick Piezoelectric Films from Laser Transfer Process; Multilayer Devices Comprised of Piezoceramic Thin Films on Dielectric Substrates; Dielectric Properties and Tunability of (Ba<sub>1-x</sub>Sr<sub>x</sub>TiO<sub>3</sub>:MgO Composites; Dynamic Linear Electrooptic Property Influenced by Piezoelectric Resonance in PMN-PT Crystals  
Electronic Devices & Applications  
Type I Base-Metal Electrode Multilayer Ceramic Capacitors; Properties of FRAM Capacitors with Oxide Electrodes; Impedance Analysis of BME Dielectric Ceramics; Electron Microscopy of Heterogeneous Interfaces in Cofired Noble and Base Metal Electrode Multilayer Ceramic Capacitors (MLCCS); Latex-Ferroelectric Composites; Comparison of Bulk and Thin-Film Ferroelectrics-A Device Perspective; Direct-Charge Capacitor Modeling; Novel BaTiO<sub>3</sub>-Ag Composites with Ultra-High Dielectric Constants Satisfying X7R Specifications  
Novel Board Material Technology for Next-Generation Microelectronic Packaging

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Sommario/riassunto

Papers in this volume include topics such as materials synthesis and processing; relaxors; novel compositions; material design; materials for multilayer electronic devices; processing-microstructure-property relationship; applications; environmental issues; and economic/cost analysis of tomorrow's electronic devices. Includes 38 papers.

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