Organizational chart

Materials

Nonoxide Ceramics

- Dipl.-Krist. Jörg Adler
- Structural Ceramics with Electrical Function
- Carbid Ceramics and Cellular Ceramics
- Nitride Ceramics and Fiber Composites
- Protective Ceramics
- Filter Ceramics and Exhaust Gas Aftertreatment

Oxide Ceramics

Dr. Sabine Begand

- Pilot Manufacturing of High-Purity Ceramics
- Oxide and Polymerceramic Composites*
- Transparent Ceramics

Processes and Components

- Dr. Tassilo Moritz
- Powder Technology
- Shaping
- Component Development and Manufacturing
- Additive and Hybrid Manufacturing

Sites and Competence Centers of Fraunhofer IKTS

- Headquarters Dresden-Gruna, Saxony
- Site Dresden-Klotzsche, Saxony
- Site Hermsdorf, Thuringia
- Site Forchheim, Bavaria
- Site Berlin, Berlin
- Fraunhofer Project Center for Energy Storage and Systems ZESS, Braunschweig, Lower Saxony
- Fraunhofer Technology Center High-Performance Materials THM, Freiberg, Saxony
- Fraunhofer Smart Ocean Technologies SOT research group, Rostock, Mecklenburg-Western Pomerania
- Biological Materials Analysis research group at Fraunhofer IZI, Leipzig, Saxony
- Circular Carbon Technologies KKT project group, Freiberg, Sachsen
- Cognitive Material Diagnostics project group, Cottbus, Brandenburg
- Fraunhofer Center for Smart Agriculture and Water Management AWAM, Porto, Portugal
- Battery Innovation and Technology Center BITC, Arnstadt, Thuringia
- Industrial Hydrogen Technologies Thuringia WaTTh, Arnstadt, Thuringia
- Application Center Water, Hermsdorf, Thuringia
- Application Center Membrane Technology, Schmalkalden, Thuringia

Institute Management

Institute Director Prof. Dr. habil. Alexander Michaelis

Materials and Process Characterization

Sintering and Characterization

- Dr. habil. Mathias Herrmann
- Thermal Analysis and Thermal Physics**
- Heat Treatment
- Ceramography and Phase Analysis
- Powder and Suspension Characterization**

Environmental and Process Engineering

Nanoporous Membranes

Dr. Hannes Richter

- Zeolite- and Carbon Membranes
- Polymer- and Mixed Matrix Membranes
- Membrane Prototypes

High-Temperature Separation and Catalysis Dr. Jörg Richter

- High-Temperature Membranes and Storages
- Catalysis and Materials Synthesis

Circular Technologies and Water

Dr. Burkhardt Faßauer

- Biomass Conversion and Nutrient Recycling
- Systems Engineering for Water and Wastewater
- Membrane Process Technology and Modeling
- Technical Electrolysis and Geothermal Energy
- Reaction Engineering Water

Chemical Engineering

PD Dr. habil. Matthias Jahn / Prof. Dr. Martin Gräbner

- Modeling and Simulation
- Process Systems Engineering
- Circular Carbon Technologies

Technische Universität Dresden

ifWW - Institute for Inorganic-Nonmetallic Materials

Prof. Dr. habil. Alexander Michaelis

- IAVT Electronic Packaging Laboratory
- Prof. Dr. Henning Heuer
- IFE Institute of Solid State Electronics
- Prof. Dr. habil. Thomas Härtling

Freie Universität Berlin

Institute for Experimental Physics Prof. Dr. Silke Christiansen Deputy Institute Director / Administrative Director Deputy Institute Director / Marketing and Strategy Deputy Institute Director / Site manager Hermsdorf Deputy Institute Director / Site manager Dresden-Klotzsche Dr. Michael Zins Prof. Dr. Michael Stelter Prof. Dr. Ingolf Voigt Dr. Christian Wunderlich

Quality Assurance Laboratory** and Mechanics Laboratory

- Chemical and Structural Analysis
- Hardmetals and Cermets

Correlative Microscopy and Materials Data

- Prof. Dr. Silke Christiansen
- Correlative Microscopy

Energy Systems

Materials and Components

- Dr. Mihails Kusnezoff
- Joining Technology
- Materials for Printed Systems
- Ceramic Energy Converters
- High-Temperature Electrochemistry and Functionalized Surfaces

System Integration and Technology Transfer

- Dr. Roland Weidl
- System Concepts
- Stationary Energy Storage Systems
- Thin-Film Technologies
- Industrial Data Concepts
- Smart Machine and Production Design
- Hydrogen Technologies

Energy Storage Systems and Electrochemistry Dr. Mareike Partsch

- Electrochemistry
- Cell and Process Development
- Recycling and Green Battery

* certified in accordance with DIN EN ISO 13485

** accreditation in accordance with DIN EN ISO/IEC 17025

Friedrich Schiller University Jena

Institute for Technical Environmental Chemistry

Prof. Dr. Michael Stelter

Ernst Abbe University of Applied Sciences Jena

SciTec – Materials Engineering Prof. Dr. Ingolf Voigt

Technische Universität Bergakademie Freiberg

Chemical Technology Prof. Dr. habil. Martin Bertau Energy Process Engineering and Chemical Engineering Prof. Dr. Martin Gräbner

Electronics/Microsystems- and Biomedical Engineering

Smart Materials and Systems

Dr. Holger Neubert

- Multifunctional Materials and Components
- Applied Material Mechanics and Solid-State Transducers

Hybrid Microsystems

Dr. Uwe Partsch

- Thick-Film Technology and Functional Printing
- Microsystems, LTCC and HTCC
- Functional Materials for Hybrid Microsystems
- Systems Integration and Electronic Packaging
- Ceramic Tapes

Testing of Electronics and Optical Methods Dr. Mike Röllig

- Optical Test Methods and Nanosensors
- Speckle-Based Methods
- Reliability of Microsystems

Systems for Testing and Analysis Prof. Dr. Henning Heuer

- Electronics for Testing Systems
- Software for Testing Systems
- Eddy-Current Methods
- Ultrasonic Sensors and Methods
- Machine Learning and Data Analysis
- Project Group Cognitive Material Diagnostics Cottbus

Microelectronic Materials and Nanoanalysis

Dr. Birgit Jost / Dr. André Clausner

- Nanoscale Materials and Analysis
- Nanomechanics and Reliability for Microelectronics

Condition Monitoring and Test Services Dr. Lars Schubert

- Condition Monitoring Hardware and Software
- Methods for Monitoring Systems
- Model-based Data Evaluation
- NDT Lab**

Bio- and Nanotechnology

Dr. Jörg Opitz

- Biological Materials Analysis
- Characterization Technologies
- Biodegradation and Nanofunctionalization
- Biologized Materials and Structures