Additive Manufacturing

- Advanced Materials for Thermoplastics
- Advanced Materials for Thermosets
- Concepts and Design Ideas for Advanced Composites
- Current Technology in Manufacturing and Materials
- National Lab and University Developments in Additive Manufacturing
- Tooling
- UV Cure Applications

Advances in Materials

- Adhesives
- Advanced Materials and Selection
- Carbon Fiber
- Coatings/Sealants/Films
- Fibers, Textiles, and Reinforcement Forms
- Flammability, Smoke, Toxicity (FST)
- Gel Coat
- Glass Fiber
- High Temperature Resins & Adhesives
- Multifunctional Materials & Structures
- Nanomaterials & Nanotechnology
- Resins & Matrices
- Sandwich Structures & Core Materials
- Smart Materials, Self-Healing, and Multifunctional Materials
- Thermoplastics Resins & Composites
- Thermoset Resins & Composites

Bonding and Joining

- Adhesives
- Composites to Composites
- Joining Simulation
- Mechanical Fasteners
- Multi-Material
Business, Regulatory, and Workforce Development

- Chemical Hazard & Safety
- Codes and Standards
- Collaborative Research Centers
- Contract Language
- Grants
- Inspiring Science, Technology, Engineering, and Mathematics (STEM)
- Intellectual Property
- Internal Training Development
- Marketing Strategies
- Mitigating Regulatory Risk while Building a Productive and Safe Operating Culture
- Partnerships Between Academia and Industry
- Reports from Industry – Academia and Government Collaboration
- Reports from Industry – Market and Technology Gaps
- Research Tax Credits
- Successful Industry/Academic Case Studies
- Tax Law
- Training, Life–Long Learning, and Next Generation Work Force
- Working with Government Representatives

Design, Analysis, and Simulation

- Advanced Design, Analysis, and Verification
- Advanced Design Methods
- Computational Materials Science and Engineering (CMSE)
- Damage, Fatigue, and Fracture
- Durability, Agility, and Long Term Performance
- Process Modeling & Simulation
- Repair
- Use of Composites with Metal, Ceramics, etc.

Green & Sustainability

- Alternative Energy
- Designing for Sustainability
- Life Cycle Assessments
- Recycling of Composites
- Renewable & Bio-Composites Materials
Manufacturing & Processing Technologies

- Advances in Automation & Affordable Manufacturing
- Advances in Prepreg Technology
- Automation & Robotics Technology
- Bonding Primary and Secondary Structures
- Composite Manufacturing & Processing
- Forming Technologies
- Large Production Volume Manufacturing Methods
- Out-of-Autoclave (OOA)
- Process Control
- Rapid Cure & Manufacturing Processing Technologies
- Resin Infusion/Liquid Molding/VARTM Composites Processing
- Tooling
- UV Cure & EB Cure

Market Applications

- Aerospace
- Architecture
- Automotive
- Bath
- Consumer Products
- Corrosion
- Energy
- Heavy Vehicle
- Infrastructure/Construction
- Marine
- Mass Transit
- Medical
- Military & Defense
- Pipe & Tank
- Recreational Vehicle
- Renewable Energy
- Sports and Recreation
- Transportation
Non-Destructive Evaluation & Testing

- Material Certifications
- Materials and Structural Test Methods
- Non-Destructive Inspection & Testing
- Sensors & Sensor Technologies
- Structural Health Monitoring