

Commercial Vehicle's Chassis and Suspension Committee

Part of the SAE Commercial Vehicle Engineering Congress (ComVEC)
1 – 3 October 2013 • Donald E. Stephens Convention • Rosemont, Illinois USA

ABSTRACTS Due by: February 12, 2013

Submit Abstracts at: <http://www.sae.org/events/cve/cfp/>

Questions? Contact Abby Hartman (ahartman@sae.org) or Sherry McCaskey (Kramer@sae.org)

Selected Papers will be considered for SAE International Journal of Commercial Vehicles

Conference Chair: **Mehdi Ahmadian**, Virginia Polytechnic Institute and State Univ.

Conference Co-chair: **Corina Sandu**, Virginia Polytechnic Institute and State Univ.

Program Committee: **Mehdi Ahmadian**, Virginia Tech; **Mustafa Ali Arat**, Virginia Tech; **Craig Birkett**, Navistar; **Shawn Bozarth**, Hendrickson Truck Suspension; **Dongpu Cao**, Lancaster University; **Eric Cochrane**, Belcan Engineering; **Brendan Chan**, Navistar; **Tye Davis**, Link Manufacturing Ltd; **Ashley Dudding**, Hendrickson Truck Suspension; **Benjamin Duprey**, Mechanical Simulation Corp; **Alireza Farjoud**, BWI Group; **Sean Fleming**, Metalsa; **Anvit Garg**, Hendrickson Truck Suspension; **Francisco Javier Gonzalez**, Metalsa; **Lin Li**, Liebherr; **Tjong Lie**, Independent Consultant; **Richard Miller**, USBR; **Jeffrey Nibbelink**, Link Manufacturing Ltd; **Mo A. Rastgaar**, Michigan Technological Univ.; **Corina Sandu**, Virginia Tech; **Jeff Sims**, Raydan Manufacturing Ltd; **Brian Southern**, Volvo Trucks North America; **Steve Southward**, Virginia Tech; **Saied Taheri**, Virginia Tech; **S. Hossein Tamaddoni**, General Motors; **Vladimir Vantsevich**, University of Alabama at Birmingham; **Peijun Xu**, Ebco Inc.; **Xiaobo Yang**, Oshkosh Corp.; **Hui Zhang**, The Ohio State University; **Xinjie Zhang**, Jilin University (China)

The technical sessions organized by the SAE Chassis and Suspension Committee will focus on topics related to analysis, design, and testing of commercial vehicle's suspension, chassis, and tire. The conference's emphasis is on the interplay of various vehicle components and subsystems on critical issues such as the vehicle dynamics, handling, ride comfort, and operational performance. Other critical issues such as the durability and life cycle performance of chassis and suspension components are also of interest for presentation at the conference.

Specifically, the topics of interest includes:

- Modeling and Analysis of Vehicle Rollover and Advanced Chassis Control Systems
- Off-road Chassis Systems and Suspension
- All Wheel Drive/Multi-Wheel Drive Vehicle Dynamics and Performance
- Heavy Vehicle Tire Maintenance Modeling & Testing
- Analysis, Synthesis, and Design of Advanced Suspensions
- Testing and Experimental Analysis of Chassis and Suspension
- Modeling of Chassis, Suspension, and Tires
- Experimental and Modeling Studies in Vehicle Dynamics, Ride, and Handling
- Hybrid drive and Chassis Systems
- Energy Efficiency Optimization/Recovery
- Semi-active and Active Suspensions for On- and Off-Road Vehicles
- Vehicle and Chassis Dynamics Challenges for Hybrid/Electric Commercial Vehicles
- Chassis and Suspension Design and Analysis for Improved Ride and Handling

- In-situ Monitoring of Structural Health and Durability based on Vehicle Usage

The primary topic for the conference are organized into the following 6 tracks:

CV201: Off-road Vehicles Chassis, Suspension, and Tires

Chair: Tjong Lie

Co-Chairs: Vladimir Vantsevich, Lin Li, Corina Sandu

CV202: Commercial Vehicles Chassis, Suspension, and Tire Modeling and Simulation Studies

Chair: Ben Duprey

Co-Chairs: Tye Davis, Hossein Tamaddoni, Alireza Farjoud, Corina Sandu

CV203: Commercial Vehicles Chassis, Suspension, and Tire Testing and Experimental Evaluation

Chair: Brendan Chan

Co-Chairs: Jeff Nibbelink, Xinjie Zhang, Xiaobo Yang

CV204: Chassis, Suspensions, and Tires for Hybrid Commercial Vehicles

Chair: Alireza Farjoud

Co-Chairs: Xinjie Zhang, Hui Zhang, Shawn Bozarth

CV205: Durability and Life-testing for Commercial Vehicles

Chair: Craig Birkett

Co-Chairs: Lin Li, Francisco Gonzales, Eric Cochrane

CV206: Vibration Isolation Techniques for On-highway and Off-highway Vehicles

Chair: Peijun Xu

Co-Chairs: Lin Li, Xiaobo Yang, Alireza Farjoud, Mo Rastgaar