

GTTC 22

GT TECHNICAL CONFERENCE

AGENDA EUROPE

Presentation Day: Oct 24, 2022

Seminar Day: Oct 25, 2022



GAMMA
TECHNOLOGIES

DAY 1 - MONDAY, OCTOBER 24 | Morning Session

07:30 REGISTRATION & COFFEE

08:15 **Opening Remarks & Welcome Address**
Jan Böbel, Manager of European Operations, Gamma Technologies
Dimple Shah, President & CEO Gamma Technologies

08:40 **KEYNOTE ADDRESS | William Bécamel**, Expert Leader Numerical Modeling and Simulation, **RENAULT**
Inter-systems Simulations: Stakes and Challenges

09:05 **KEYNOTE ADDRESS | Ivan Krajnović**, Head of Simulations, **RIMAC Technology**
Always Going the Extra Mile

09:30 **Gamma Technologies | Dan Marsh**
Cultural Shift to Simulation

09:50 REFRESHMENTS & EXHIBITION

	VEHICLE THERMAL MANAGEMENT	FUEL CELL	MECHANICS	ENGINE/COMBUSTION & AFTERTMNT.
10:30	Volvo Goup <i>Amirreza Movaghar</i> Cooling Strategy Assessment on Performance and Aging of Lithium-Ion Battery Pack	Freudenberg Fuel Cell e-Power Systems GmbH <i>Stephan Karmann</i> Development of the Fuel Cell Systems for Maritime Applications using LNG as a Fuel	Rheinmetall AG <i>Frank Seifert, Artur Hottmann</i> 3D-MBD Simulation model of the DuoCam	Robert Bosch GmbH <i>Gabriele Sgroi</i> H2 ICE: Air system Concepts for the Heavy Duty Application
10:50	Rimac Technology <i>Karl Hohenberg</i> A System-level Model for the Prediction of Electric Drive Unit Thermal Performance	MAHLE International <i>Thomas Friedrich</i> Fuel Cell System Simulation for Heavy Duty Applications	Liebherr Components Colmar <i>Mathieu Mincato</i> On the Improvement of Cranktrain Bearings Simulation Methodology	Scania <i>Haohao He</i> GT-POWER-xRT in SiL and HiL Testing for Combustion Engines
11:10	Ariamis <i>Michaël Sikander</i> Thermal Management Focused on Fuel Cell Vehicle by GT-SUITE	Symbio <i>Emilien Sopetti</i> Hydrogen Recirculation System Optimization for a PEM Fuel Cell	Garrett Advancing Motion <i>Juraj Pospíšil</i> New Approach in Wastegate Turbo Kinematics	Punch Torino <i>Alessandro Grosso</i> Calibration Optimization of a Dual Fuel (Diesel + Hydrogen) Engine Using GT-SUITE
11:30	EMISIA <i>Giouli Paisiou</i> Virtual Benchmarking of Mobile Air Conditioning Systems to Support 'Eco-Innovation' Policies	Powercell Sweden AB <i>Stefan Bohatsch</i> Integration of Fuel Cells and Electrolysers in Powergrid Applications	Universidade de Vigo <i>Javier Blanco-Rodríguez</i> Friction and Wear Assessment of Ultra-low Viscosity Oil Formulations Based on a Validated Elasto-hydrodynamic Simulation Model	Renault/Powertech <i>A. Lefebvre / E. Graziano</i> Fuel EVAP System Design and Control Optimization via Integrated 1D Simulation to Tackle Future Emissions Standards
11:50	Vedecom <i>Ilango Thiagalingam</i> A Numerical Platform to Design Thermal Comfort Solutions	Bramble Energy <i>Puneet Jethani</i> 1D-Fuel Cell System Modelling for Autonomous Vessel using GT-SUITE	MAHLE Powertrain <i>Jens Neumeister</i> Investigation of a Gear Wheel Failure in the Power Train of a Hybridized Heavy Duty Truck Engine	FEV Europe GmbH <i>Florian Tidau</i> Power-to-Methanol Plant Simulation-based Concept Layout

12:10 LUNCH & EXHIBITION

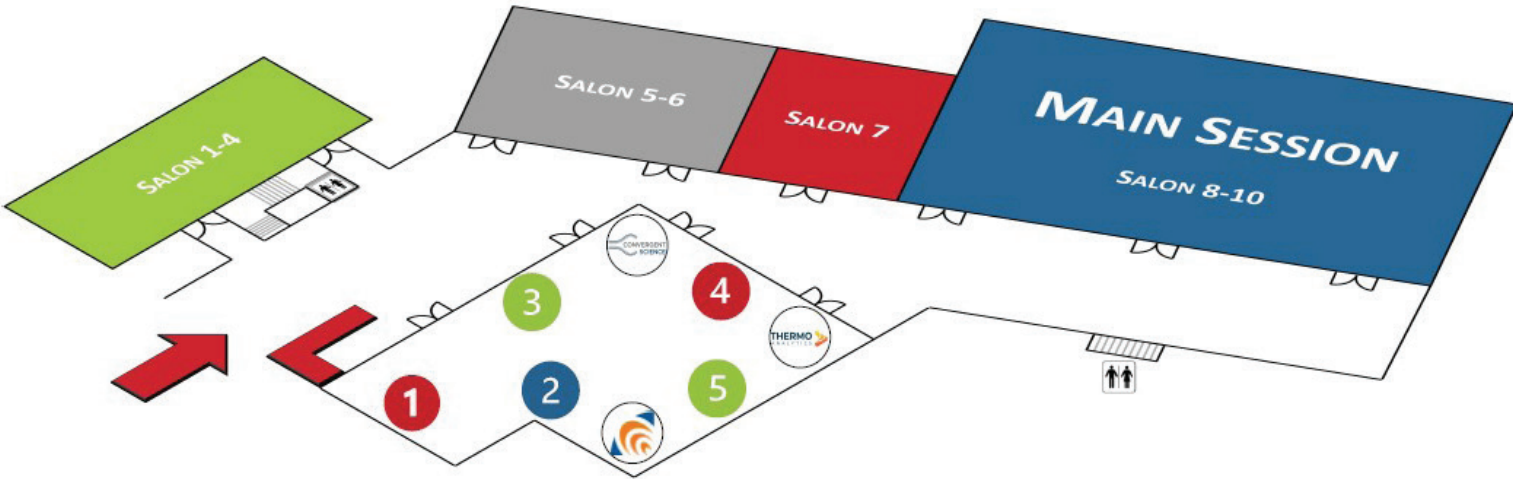


DAY 1 - MONDAY, OCTOBER 24 | Afternoon Session

	BATTERY	XIL/CONTROLS	FLUID SYSTEMS	COMPONENT THERMAL MGMT.
13:30	Williams Advanced Engineering <i>Giulio Spedicato</i> 1D Battery Electrothermal Models Correlated with Track Data for Motorsports Application	InfiMotion Technology Europe AB <i>Shino George</i> Math – Rig – Road: Virtual Calibration of an Electric Rear Axle Installation using GT-SUITE	Faurecia <i>Julien Hergott</i> Cryogenic Hydrogen Storage Simulation with GT-SUITE	Valeo <i>Jérémy Blandin / Marc Baronnier</i> Battery Pack Design with Immersive Cooling using GT-SUITE and GT-CONVERGE
13:50	Scania <i>Litao Yin</i> Electrochemical Performance of Large Prismatic Cells	ACTA Industrie <i>Remi Roussel</i> Coupling a PLC with GT-SUITE Air Handling Unit Model	Powertrain Engineering Sweden <i>Lars-Olof Carlsson</i> Aspects on ICE Oil system GT-ISE model accuracy - Volvo Engine Petrol VEP4 gen 3	BMW M <i>Anirudh Jaipuria</i> Thermal Simulation Workflow for High Performance Electric Motors
14:10	Ford Otosan <i>Elif Gözen</i> Aging Prediction Study, First-Time-Through with GT-AutoLion	Politecnico di Torino <i>Luciano Rolando</i> Development of a Virtual Test Rig for Advanced Thermal Management System for Battery Electric Vehicles	Obrist Engineering <i>Markus Öttl</i> Enhancing a Matlab-based Scroll Simulation Tool with GT-SUITE	Rimac Technology <i>Nikola Vujanović</i> Applying a General Cylindrical Element with Additional Thermal Resistance for Simplified Three-dimensional Thermal Modelling of Cylindrical Battery Cells
14:30	Universitat Politècnica de València <i>Alvaro Fogué Robles</i> Identifying Key Aspects of Thermal Runaway Modelling for Lithium-ion Battery Cells using GT-AutoLion	Bosch Engineering GmbH <i>Marinus Wieser</i> Free Piston Engine as an ORC Expander-compressor Unit for (waste) Heat Powered Air Compression	KEYOU <i>Daniel Grassinger</i> Hydrogen Specific Fuel Rail – Modelling Approach	ProFEMAG / Gamma Technologies <i>Egli/Brenner/Nalam</i> FE Electromagnetic Approach to eMotor Cooling
14:50	REFRESHMENTS & EXHIBITION			
15:30	POWERTECH ENGINEERING Eduardo Graziano <i>Development of a 1D Multi-Physics PHEV model for Thermal and Energy Management Optimization</i>			
15:50	SANDEN Olivier Derollepot <i>GT-Play Implementation and Roadmap for Spreading Simulation Information at SANDEN</i>			
16:10	TOSHIBA Ryosuke Yagi <i>Toshiba Rechargeable Battery "SCiBTM" Cell Model with GT-AutoLion</i>			
16:30	GAMMA TECHNOLOGIES Iakovos Papadimitriou, GT Chief Technology Officer <i>Multi-Scale Multi-Domain Developments</i>			
17:10	ADJOURN & BEER BREAK			
19:30	BLACK JACK NIGHT			

DAY 1 - MONDAY, OCTOBER 24 | Maps

08:15	AM MAIN SESSION			
10:30	FUEL CELL	ENGINE/COMBUSTION & AFTERTREATMENT	MECHANICS	THERMAL MANAGEMENT
13:30	XIL/CONTROLS	COMPONENT THERMAL MANAGEMENT	FLUID SYSTEMS	BATTERY
15:30	PM MAIN SESSION			



- 1

DRIVING PRODUCTIVITY & COLLABORATION
- 2

EXPANDING HORIZONS
- 3

GREEN & CLEAN
- 4

THE NEED FOR SPEED
- 5

VEHICLE ELECTRIFICATION
- 

CONVERGENT SCIENCE
- 

PROFEMAG
- 

THERMOANALYTICS