15th Symposium "Magnetoresistive Sensors and Magnetic Systems"

In our current "age of digitalization" sensors play an especially important role, be it for the measurement of movement, orientation, electrical current or magnetic fields. Completely new applications are emerging. In order to fulfil novel and even more demanding requirements a close cooperation between science and industry is necessary. The MR-Symposium provides the ideal platform for an update regarding the latest developments.

You are a forward-thinking expert in the field of magnetic sensor technology and you would like to be inspired by the latest developments in this field? Join us at the MR Symposium Magnetic. Register – to be up to date.

|Focus of the Symposium

The symposium serves as a forum for the exchange of innovative ideas and practical experience with magnetoresistive technology among experts from research institutes as well as practitioners from a variety of different application areas, e. g. automotive sector, industrial automation, bio technology, condition monitoring and others. The presentations cover also fundamental technological advances, e. g. in TMR sensor technology. Participants gain an overview of research findings and latest developments - to be prepared for the sensorization of the future.

REGISTRATION

HOW TO REGISTER

Please register by post, fax or internet. Your registration is requested **by 8th March 2019**. If you cancel your participation after 1st March 2019 a refund of the fee is not possible.

- Via post Sensitec GmbH Ellen Slatter Georg-Ohm-Straße 11 35633 Lahnau, Germany
- Via telefax to +49 6441 9788-17 For fax reply form, please refer to the rear page of the invitation letter or load it down from www.xmr-symposium.com .

Via internet Online registration via www.xmr-symposium.com

- FeeWith early bird discount (til 18th Feb. 2019):Euro 550 plus VATAfter 18th February 2019: Euro 620 plus VATStudent fee: Euro 250 plus VATFor members of the AMA Association forSensors & Measurement we give a specialdiscount of 50 Euro.
- ImportantOn receipt of registration you will get a con-
firmation by mail. The invoice will be sent by
post to your postal address. Please note
that we cannot accept payment by
credit card at the event itself. So please
ensure that payment is made in advance. The
fee includes conference proceedings, lunch
and refreshments on both days as well as
dinner incl. special programme. The invoice
for advance payment will be issued after
receipt of registration. Please note that during
the event photographies or video material will
be created which might be used for further
publications.

YOUR CONTACT

Sensitec GmbH is organizer of the international MR-Symposium (www.sensitec.com).

Organisation Ellen Slatter, +49 6441 97 88-16 ellen.slatter@sensitec.com

TechnicalDr. Joachim Hölzl, +49 6441 97 88-46mattersjoachim.hoelzl@sensitec.com

Location Stadthalle Wetzlar Kongress- und Kultur-Zentrum Brühlsbachstraße 2b 35578 Wetzlar (for route description, please refer to http://www.xmr-symposium.com)

Hotel Please make your own hotel reservation. The following hotels provide a limited contingent of rooms (reference: MR-Symposium Sensitec):

> Hotel Wetzlarer Hof +49 6441 908-0 (until 25th February 2019) Hotel Bürgerhof +49 6441 903-0 (until 25th February 2019) Michel Hotel Wetzlar +49 6441 417-0 (until 15th February 2019)

Dinner and
special
programmeOn 19th March 2019 we invite you to join us for
dinner including special evening programme.
As this is an option, please indicate your par-
ticipation on the registration form accordingly
when registering.

15th international Symposium

Magnetoresistive Sensors and Magnetic Systems

19th and 20th March 2019 in Wetzlar



CONFERENCE PROGRAMME

15th Symposium "Magnetoresistive Sensors and Magnetic Systems"

WHO SHOULD ATTEND

The international MR-Symposium is addressed to technical and forward-thinking experts in many industrial areas such as the automotive industry, automation, medical technology, materials testing and consumer sectors.

Representatives of all industries, who are involved in the design, fabrication, testing, qualification and research of MR technology and magnetic systems and who wish to enhance their knowledge are invited to participate.

The conference covers subjects like:

- New XMR technologies and sensor concepts
- Condition monitoring
- Sensors in harsh environments
- Innovative applications •
- Magnets and magnetic properties
- Bio sensor technology •
- Roadmap for MR sensors in the new age • of the car

Register now under
www.xmr-symposium.com

Time	Торіс	Speaker				
	Tuesday, 19 th March 2019					
10.00 - 10.15	Welcome and introduction	Rolf Slatter, Sensitec GmbH				
10.15 - 10.45	Magnetic position sensor system with submicron accuracy	Johannes Paul, Sensitec GmbH				
10.45 - 11.15	Advanced TMR sensing solutions for reliable, precise and robust motor control applications	Matthieu Rezé, TDK-Micronas GmbH				
11.15 - 11.45	Magnetoresistive materials and sensors: seeking for solutions that meet the application specifications	Susanna Cardoso de Freitas, INESC- MN, Portugal				
11.45 - 12.15	Implementation and results of a nonius measuring system using TMR technology	Mikael Bianchi, University of Applied Sciences of Southern Switzerland				
	12.15 - 13.15 Lunch					
13.15 - 13.45	Robust predictive maintenance approach for the conveyor belt in potato harvesters monitored by AMR sensors	Paaranan Sivasothy, Technical University of Kaiserslautern				
13.45 - 14.15	Applications of magnetoresistive technology in real-time machine monitoring	Patrick Langfeldt, optiMEAS Measurement and Automation Systems				
14.15 - 14.45	MR sensors for condition monitoring of insulation ageing in electrical machines: preliminary analysis and future prospects	Luca Peretti, KTH Royal Institute of Technology, Sweden				
14.45 - 15.15	Spin electronics based sensors for biological applications	Claude Fermon, CEA, IRAMIS, France				
15.15 - 15.45 Coffee break						

11.30

scale

Time	Торіс	Speaker		Time	Торіс	
	Tuesday, 19 th March 2019				Wednesday, 20 th March 201	9
15.45 - 16.15	Rugged bearing-less modular encoders for harsh industrial environment	Bill Mueller, Nidec Industrial Solutions Avtron Sensors and Actuators, USA		11.30 - 12.00	High-precision magnets for new Hall-effect based position sensors	F
16.15 - 16.45	AMR sensors under harsh magnetic conditions	Stefan Basler, Baumer MDS GmbH		12.00 - 12.30	Magneto optical sensors for magnetic stray field examinations	F
10.15					12.30 - 13.30 Lunch	
16.45 - 17.15Sensor for oil drilling head		Amir Souii, Baker Hughes		13.30- 14.00	Application of MR sensors in a linear transportation system	A J O B
19.00 Conference dinner and evening show in town hall. Please indicate your participation on the registration form.			14.00 - 14.30	New approach for linear position measurement	A C	
Time	Торіс	Speaker	1	14.30 - A novel stray field compensation		K
Wednesday, 20 th March 2019 Christoph Nebel,			15.00	for angular AMR sensors	O So	
8.30 - 9.00	Diamond for quantum-tec magnetometry	Fraunhofer IAF Freiburg	15.00 - 15.15 Coffee break			
9.00 - 9.30	High pulsed magnetic fields: applications and measurement with magnetoresistive sensors	Jonas Klimantavicius, State Centre for Physical Sciences and Technology, Lithuania		15.15 - 15.45	XMR sensors for 3D printers	N Te O
9.30 - 10.00	Simultaneous measurement of resistance and temperature in Wheatstone bridge circuits	Klemens Gintner, University of Applied Sciences Karlsruhe		15.45 - 16.15	AMR-based mechanical pressure sensors: a proof of concept	N U H
10.00 - 10.30 Coffee break			16.15 - 16.45	Roadmap for MR sensors in the automotive sector / Sensors in the new age of the car	R ⊩	
10.30 - 11.00	Optimization of magnetic systems through finite-element modeling	Martijn Leskens, Goudsmit Magnetic Systems, Netherlands		16.45 - 17.00	Outlook and closing remarks	Ri
11.00 - 11.30	Characterization tool of the magnetic properties at the local	Aurélie Solignac, CEA, IRAMIS,			Pr	elir

France

Preliminary programme. We reserve the right to make changes without prior notice Picture source front page: Fotolia.

Andre Akkerman,

Jeroen Vennegoor

Andreas Voss. TE

Kris Rohrmann, Ostfalia University of

Meinhard Schilling,

Technical University

of Braunschweig

Rolf Slatter, Sensitec GmbH