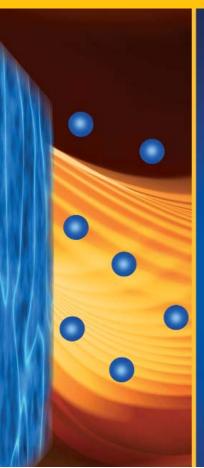




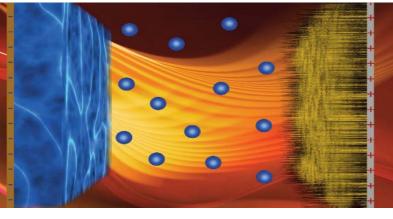
FRAUNHOFER-INSTITUT FÜR WERKSTOFF- UND STRAHLTECHNIK IWS

## WORKSHOP "LITHIUM-SULFUR-BATTERIES"



November 15, 2012 Fraunhofer IWS Dresden

PROGRAM



Ladies and Gentlemen,

Lithium-sulfur (Li-S) is expected to be the next generation battery chemistry of energy storage systems. They are supposed to deliver highly specific energies, which are 2 - 4 times higher than current lithium-ion systems. Another advantage is that sulfur is a cheap and abundant resource and no expensive or even harmful metals are needed as it is the in case of lithium-ion cathodes (e.g. LiCoO<sub>2</sub>).

Novel materials such as nanostructured carbon/sulfur composite cathodes, solid electrolytes and alloy-based anodes are expected to significantly enhance the cell performance.

The workshop is an excellent platform for experts from industry and research to present and discuss the most recent developments of new materials, processes and applications of Li-S-batteries.

We are looking forward to welcoming you in Dresden.

Cochorer Deeps

**Eckhard Beyer Executive Director** 

Styn lender

Stefan Kaskel Head of Department Chemical Surface and Reaction Technology

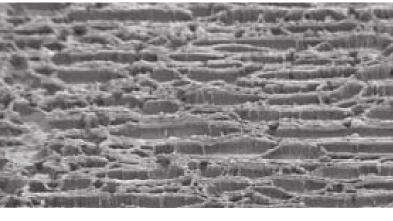
Fraunhofer IWS Dresden

### PROGRAM

08:30 Registration

#### Session I (Materials)

- Chair: Eckhard Beyer, Fraunhofer IWS, TU Dresden
- 09:00 Welcome and opening Eckhard Beyer, Stefan Kaskel, Fraunhofer IWS, TU Dresden
- 09:15 A contribution to the progress of high energy batteries: development of advanced lithium-sulfurbatteries Bruno Scrosati, Università degli Studi di Roma "La Sapienza"
- 10:00 Recent developments on Li-S battery from the perspective of a chemical company Jan Tomforde, BASF SE
- 10:30 Coffee break
- 10:45 Li<sub>2</sub>S/Si-cell concepts with nanostructured electrodes Jens Tübke, Fraunhofer ICT
- 11:15 Development, characterization and product perspective of inorganic solid ionic conductors Wolfgang Schmidbauer, Schott AG
- 11:45 Carbons for energy system applications Astrid Rota, SGL CARBON GmbH
- 12:15 Lunch break



#### Session II (Processing)

- Chair: Stefan Kaskel, Fraunhofer IWS, TU Dresden
- 13:00 Dry processing of self-supporting sulfur cathodes Sören Thieme, Fraunhofer IWS
- 13:30 Coating technologies and coating plant concepts for the production of battery electrodes Andrea Glawe, KROENERT GmbH & Co KG
- 14:00 Cell manufacturing aspects for next generation batteries Stefan Koller, VARTA Micro Innovation GmbH
- 14:30 Coffee break

#### Session III (Applications / Trends)

- Chair: Holger Althues, Fraunhofer IWS
- 14:45 Recent developments on Li-S battery from the perspective of an automotive supplier Martin Tenzer, Robert Bosch GmbH
- 15:15 Future energy storage from automotive perspective Jörg Huslage, Volkswagen AG
- 15:45 Batteries 2030: a roadmap Kai-Christian Möller, Fraunhofer ICT
- 16:15 Concluding remarks Stefan Kaskel, Fraunhofer IWS, TU Dresden
- 16:30 IWS lab visit (optional 1h)

## **ORGANIZATION**

#### Location

Fraunhofer IWS Dresden 01277 Dresden, Winterbergstr. 28 Phone +49 351 83391-0 www.iws.fraunhofer.de

Workshop language: English

Workshop fee:	180 €
	(payable on receipt of the invoice)

The fee includes a conference binder and refreshments.

#### Registration deadline: October 29, 2012

Cancellation of registration is possible by November 5, 2012. After this date the full costs will be charged.

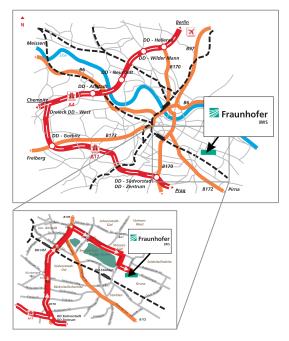
#### Contact

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Fraunhofer IWS Dresden Winterbergstr. 28 01277 Dresden, Germany

Further information (online registration / accomodation) is availble at **www.iws.fraunhofer.de/en/events.html** 



#### Directions

by car (from Autobahn / Highway)

- take Autobahn A4 or A13 to inter section Dresden-West, follow new Autobahn A17 to exit Südvorstadt / Zentrum
- follow road B170 in direction Stadtzentrum (city center) to Pirnaischer Platz (about 6 km)
- at Pirnaischer Platz turn right towards "Gruna / VW-Manufaktur"
- continue straight until the end of the "Großer Garten" (Great Garden) and then turn right onto Karcherallee
- at the next traffic light turn left onto Winterbergstraße and continue straight until IWS

by railway and tram

- from Dresden main railway station line #10 to Straßburger Platz
- change to line #1 or #2 heading out from the city (towards Prohlis or Kleinzschachwitz); exit at Zwinglistraße stop
- 10 minutes to walk from there (in the direction of Grunaer Weg) or one station by bus # 61 (direction Löbtau)

by air plane

- from Airport Dresden-Klotzsche by taxi to Winterbergstraße 28 (distance is approximately 7 miles or 10 km)
- or with public transportation (shuttle train) to the main railway station (Hauptbahnhof), and continue by tram

# Workshop »Lithium-Sulfur-Batteries«

November 15, 2012

Fraunhofer-Institut für Werkstoff- und Strahltechnik IWS

Manja Schulze Winterbergstr. 28 01277 Dresden Germany



Please mail or fax Fax: +49 351 83391-3300

Workshop »Lithium-Sulfur-Batteries«	Registration (in block letters)
	Last name
November 15, 2012	
·	First name
Winterbergstr. 28, 01277 Dresden, Germany	Company / Institution
Registration fee: <b>180 €</b> (payable on receipt of invoice)	Billing address
The fee includes a conference binder and refreshments.	
Registration deadline: October 29, 2012	Phone / Fax
Cancellation of registration is possible by November 5, 2012.	E-mail
	Place / Date
רמו ווכושמווטוז זוז מ זמט עוצור מר זעט מונפר שטראצוזטט (טעומנוטוז ד דוטעו)	
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